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Clinical Medicine and Surgery

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★ Editorial ★

Thomas L. Stedman

Versatile Scholar and Medical Lexicographer

THE GENERAL public (quite naturally) and many of the members of the medical profession (unfortunately) have a tendency to look upon the famous clinicians as the only truly noteworthy men of Medicine. It is well to remember, however, that the fame of the clinicians largely rests upon the work of the great scholars and writers of our profession, who have immortalized the work of the clinicians and researchers and made it readily available to all who are ministering to the needs of the sick and suffering.

One of these recorders and transmitters of medical knowledge and traditions, Thomas Lathrop Stedman, was born at Cincinnati, Ohio, October 11, 1853.

Young Thomas attended the public and private schools, like other boys, and in 1874 received his A.B. degree from Trinity College, Hartford, Conn., which also gave him his Master's degree in 1896. The next year he spent at Jefferson Medical College, and then changed to the College of Physicians, and Surgeons, New York (now Columbia University), from which he was graduated in 1877.

From 1876 to 1879, Dr. Stedman was house surgeon at St. Luke's Hospital, New

York, and from 1881 to 1886 at the New York Orthopedic Hospital and Dispensary.

Early in his professional career, the Doctor began to show his deep interest in and talent for medical literature, and about 1890 was made assistant editor of the *Medical Record*, and became its editor-in-chief in 1897. This highly important position he filled, with great honor and wide usefulness, for twenty-five years. Many of our readers will remember with deep gratitude the help they received from that splendid magazine.

In 1904 he entered the field in which his name is best known (medical lexicography), by editing the 23d edition of Dunglison's "Medical Dictionary." Not long after that he edited the medical terms in the "Century Dictionary." In 1911, after years of preparation, the first edition of his "Practical Medical Dictionary" appeared, and in it his immense general, as well as medical, scholarship and the results of his long years of editorial experience, were so apparent that it at once took its place high in the list of authoritative medical reference works. It has always been the most individual of all the great medical dictionaries.

In his prime, Dr. Stedman was a tremendous worker. In addition to editing a weekly journal, writing articles and reviews almost daily, reading hundreds of manuscripts, and attending many medical meetings, he edited the "Twentieth Century Practice of Medicine," in 21 volumes (1895-1903); the monumental "Reference Handbook of the Medical Sciences," an 8-volume encyclopedia; and the "Nurse's Medical Lexicon" and "Shorter Medical Dictionary" (1931). As an evidence of the astonishing versatility of his scholarship, he also wrote "A Chinese and English Phrase Book in the Canton Dialect" (with K. P. Lee—1888) and "Modern Greek Mastery" (1896), and carried on "The Complete Pocket Guide to Europe," which was inaugurated by his relative, Edward Clarence Stedman.

His enormous and vastly fruitful labors came to an end on May 27, 1938, in the eighty-fifth year of his age, within a few yards of the hospital in which he gained his first medical experience 62 years before. He continued busily and happily at work upon his beloved dictionary until within a few weeks of the end.

Recognized as one of the profoundest scholars and most cultured men in the American medical profession, Dr. Stedman was no pedant, but a simple, modest, and friendly soul. A man of strong and well founded opinions, he respected the opinions of others, as a gentleman should, but he was an uncompromising individualist and was jealous of the honor and wellbeing of his profession and of all its members. He fought all tendencies towards dictatorship and regimentation to the very last.

His ashes were scattered over the soil of his old family homestead in Ohio, but his works remain as an imperishable monument to him, and his life should be a perpetual inspiration to the members of the profession he adorned, especially in these trying days when more men of his stalwart kidney are so urgently needed.

"Nut College" Alumni

IT HAS LONG BEEN THE CUSTOM for graduates of our institutions of the higher learning to associate themselves in groups, for the fostering of friendships and for mutual pleasure and spiritual profit. But until quite recently, the "graduates" of one of the most important types of educational institutions in the land (formerly called

"asylums"; more lately, "mental hospitals"; vulgarly, but expressively, "nut colleges") have been so pitifully few that no one has ever thought of organizing them.

Now, however, with the remarkable modern methods of treating psychic disorders, they have become so numerous that one group of the veterans of mental illness has inaugurated the Association of Former Patients of the Psychiatric Institute of the University of Illinois and the State Department of Public Welfare (a fearsome title!), and has begun the publication of a magazine, *Lost and Found*, in which the idea will be stressed that "things have changed."

This is an impressive sign of the times, whose significance can hardly be evaluated for some years. When recovered mental patients begin to tell the world about it, in a straightforward and hopeful manner, the medieval attitude of superstitious shame and secrecy which has hitherto surrounded this type of disorders will surely change, and when it does there will be as good a hope for the success of programs of psychic hygiene as there is now for the physical hygienic measures which are now so deservedly popular.

Respiratory Diseases Are Coming

ABOUT THE FIRST OF OCTOBER the respiratory diseases will begin to return, if the course of events runs true to form during the approaching season. Colds, influenza, pneumonia, scarlet fever, diphtheria, and the others, which have been at minimum prevalence for several weeks, will begin to rise gradually, working up towards peaks in the autumn and winter.

A good deal may be done to thwart the usual course of many of these infections. Diphtheria can be prevented by inoculation (educate your patients), which to be effective must be done several weeks ahead of exposure to infection. The chief risk from that disease occurs during the autumn. Pneumonia can be robbed of much of its terror, in many cases, by the timely use of serum. This, of course, requires prompt diagnosis, prompt typing, and prompt treatment with the appropriate serum.

This means, learn to do your own typing, if you have a microscope (if not, see that the laboratory you use is prepared to do it

or get in touch with your State Board of Health laboratory); brush up on your physical diagnosis; and see that your pharmacist lays in a supply of pneumonia serums.

Inoculation is effective against scarlet fever also, but the necessity of five injections, given at weekly intervals, and occasional rather severe reactions tend to discourage this method of prevention.

An ample supply of vitamin A and hygienic living will help to ward off colds and influenza. The very fact that these diseases are rare in the summer suggests, that such things as ventilation and the heating of home and work places, which result in abrupt changes in temperature upon going into the open, have an important influence in the cause of colds. People also "catch" them in crowded places.

Typhoid fever is rather widely prevalent, being primarily a disease of late summer and autumn. Case reports have run at about the level of the past few preceding years, greatly below former experience, but high enough to constitute a considerable problem.

Infantile paralysis is also somewhat more prevalent than earlier in the year, this being the main season for that disease.

"Forewarned is forearmed." We all know that the "holiday" for respiratory diseases is over, and if we are not prepared to deal with them in a prompt and decisive manner, it will be our own fault—and our patients are liable to find that out, to the detriment of the lazy or thoughtless ones.

Nothing inspires confidence in a businessman sooner than punctuality, nor is there any habit which sooner saps his reputation than that of always being behind time.—A. MATHEWS.

Proctology

LIKE ALL THINGS else which have extension in finite space, the gastro-intestinal canal has two ends.

The upper or entrance end is considered one of the most respectable or even noble parts of the body. Its contours and coloring are considered beautiful and have been celebrated in song and story from time immemorial.

Just within this orifice are a number of structures which are of the greatest interest to the medical profession—the teeth, tongue, tonsils, and adenoids—arranged in

a complicated manner which furnishes many opportunities for hidden nidi of infection.

More physicians have, in all probability, devoted their lives to the study of the upper end of the gastro-intestinal canal, with the superior respiratory structures which accompany it, than have engaged in the practice of any other medical specialty, and much progress has been made in curing the ills to which these parts are liable.

On the other hand, the lower or exit end of this selfsame tube has, by all civilized peoples, been considered pudendous and disgusting, so that even its name has always been taboo in respectable society. Its contours and coloring are unattractive and its anatomic situation removes it from the field of observation, even by its possessor. The exercise of its functions gives its normal owner no specific and definite pleasure, such as that derived from the various uses of the mouth.

Even the most delicate lady has no hesitancy in discussing freely, not only with her physician but also with her friends of both sexes, the condition of her teeth and tonsils; while even men of experience show a diffidence in expounding their rectal symptoms, even in the privacy of the consulting room. The mention of an oral surgeon arouses a feeling of respect and admiration; while an allusion to a proctologist is likely to be greeted with prurient snickers.

Are there, then, differences in the respectability of different parts of the same human body? If Society—note the capital S—sees such differences, the physician recognizes none. All parts are alike to him in his search for the causes and cures of disease.

The rectum, while lacking the obvious variety of structures found in the mouth, is, none the less, a very complex organ, anatomically and histologically. The blood supply of its upper end connects with the portal system, while that of its lower portion is derived from the general circulation. It is surrounded by delicate and sensitive muscles, whose condition, as to irritation and spasm, exercises profound effect upon the nervous system.

Like the mouth, its actual orifice has a cutaneous covering, while it is lined with mucous membrane. Its blood supply is as free and as susceptible to deleterious influences as is that of the oral cavity. The bacterial flora of the two structures is similar in many respects, in abundance and variety. The glandular and cryptic struc-

ture of the two organs has many points of resemblance and offers quite comparable opportunities for the encystment and retention of infectious material which, in either case, may give rise to serious or dangerous toxemia.

The physician who neglects the rectum, when inquiring into the etiology of any chronic disturbance of general health or functioning, is doing an injustice to his patient and to himself: To his patient, because every person who is ill is entitled to a complete opinion from his medical attendant; to himself, because he thus loses many opportunities for increasing his diagnostic and therapeutic prestige, as well as improving his financial position.

The diseases of the rectum are no more difficult to diagnose and treat than are those of the mouth, nose, and throat, and the results from proper and skillful diagnosis and treatment are no less spectacular and satisfying. Rectal diseases cause almost, if not quite, as much acute and chronic distress and incapacity as do those of the entrance to the digestive canal—but they are far less thoroughly studied and discussed and adequately treated.

The field of the "head specialties" is, if anything, overcrowded at the present time; while proctology has far too few skilled representatives. Moreover, the treatment of the simpler rectal diseases is entirely within the powers and facilities of the general practitioner, even in the remoter districts, and the diagnosis and treatment of

such conditions would do much to ameliorate many of the various conditions of which certain country doctors are making such bitter complaint.

A questionnaire, some time ago, brought out the fact that only five, out of a total of 1423 physicians interviewed, were especially interested in proctology. General practice attracted the most attention from 326; minor surgery, of 79; economics, of 161; health conservation of 60; and physical therapy, geriatrics, gynecology, cancer, and nervous and mental diseases, of enough more to make a total of 765—more than half of the total number.

All of the subjects just mentioned are closely bound up with the study and practice of proctology and all who are interested in them should find a corresponding interest in some phases of the problem of rectal diseases.

NEXT MONTH

Dr. F. A. Wier, of Racine, Wis., will offer some highly practical suggestions regarding the conservative treatment of the diseased maxillary antrum.

Dr. Orville E. Barbour, of Peoria, Ill., will present a highly interesting report on the treatment of coughs by the oral administration of whole adrenal gland.

Dr. R. L. Gorrell, of Clarion, Iowa, will describe a simple method for blood typing and transfusion, suited to the needs of surgeons and hospitals in small towns.

COMING SOON

"Cathartic Colitis," by John C. Brougher, M.D., Vancouver, Wash.

"Psychoneurotic Complaints Initiated by the Physician," by Leon M. Beilin, M.D., Chicago, Ill.

OCTOBER

*Corn shocks
Loom spectral through
Leaf smoke tinged by the red
Glow of the sunset. Dear Summer
Is gone.*

G. B. L.

★ *Leading Articles* ★

Psychic Factors in Sexual Impotence

By

GEORGE B. LAKE, M.D., Chicago, Ill.

FROM TIME immemorial, the act by which human souls are brought into the world has been esteemed a matter of tremendous importance, or even veneration and worship (as in the numerous phallic cults), not only on account of the vital part it plays in the biologic process of reproduction, but also as a symbol of the divine creative activity operating in the cosmos.

Animals and animal men are never impotent except as a result of organic or anatomic causes, or that major physiologic involution which we call senility. The more nearly a man approximates the purely animal type, the less he has to fear the development of impotence, even at an advanced age.

But as men begin to engage more and more in the strictly *human* functions of thinking and the higher and less purely physical emotional activities, the more frequently does impotence appear at a relatively early age, so that it has come to pass that practically every *civilized* man over forty years old (and many long before that) has experienced total or partial impotence, at some time and under certain conditions.

It is, therefore, vastly important that all physicians should have a clear and reasonably complete idea of the mechanism of the psychic factors which underlie at least 90 percent of these distressing cases, so that the treatment of them may be undertaken with that degree of intelligence which will make their amelioration or complete relief at least relatively certain. Even though a physician may not care to undertake the management of definite psychic disorders, the mere *explanation* of the psychic factors in impotence has been known to cure cases of that condition.

Classification

In order to orient the subject of this discussion in the general field, a brief, but sufficiently practical, outline of classifications will be in order, though it must be understood that impotence is not a disease,

but merely a symptom of a wide variety of more or less abnormal conditions.

The various *types* of impotence may be listed as: (1) *Impotentia libidinis* (lack of desire or true frigidity); (2) *impotentia voluptatis* (failure to obtain satisfaction in coitus); (3) *impotentia generandi* (inability to procreate—sterility); and (4) *impotentia coeundi* (inability to perform the sexual act, even when desire is present).

From the standpoint of etiology, impotence may be classified as: (1) *Anatomic*, due to deformities, deficiencies, or overdevelopment of the penis resulting from congenital malformations (true or pseudo hermaphroditism, epispadias, hypospadias, etc.), accidental or surgical trauma (fracture or amputation of the penis, etc.), or disease of the penis (ulcerations, plastic induration, etc.) or of other parts of the body (advanced arthritis of the spine and hips preventing flexion, obesity, etc.); (2) *pathologic*, resulting from general systemic diseases such as tabes, paresis, arteriosclerosis, diabetes, nephritis, pronounced neurasthenia (whatever that may mean), or any chronic condition producing cachexia, or from disorders of the genito-urinary organs, such as prostatitis, verumontanitis, etc.; (3) *toxic*, due to overindulgence in alcohol, morphine, cocaine, tobacco, or other habit-forming drugs; (4) *physiologic*, the result of hypogonadism or other endocrine deficiency, senility, or excessive activity of the sex organs; and (5) *psychic*, produced solely by hyperexcitability, or inhibitions, or aberrations, originating in the emotional or mental levels of consciousness. Groups 1 and 2 may be classed as organic; groups 3, 4, and 5 as functional.

Impotence may also be *complete* (when a man is totally unable to perform the act at any time), or partial, relative, or temporary (when he fails at certain times or under certain conditions, but is fully potent at other times or under other conditions, as when a man is quite impotent when sober, but capable when mildly intoxicated; or

when he is able to give complete satisfaction to one woman but fails lamentably with another).

This discussion will deal solely with *impotentia coeundi* (inability to consummate the sexual embrace satisfactorily), resulting entirely from psychic factors, conscious or unconscious, mental or emotional, and of a relative or temporary character.

Before entering upon this discussion, it should be understood that there are as great individual variations in sexual power as there are in any other of the other human functions, such as muscular strength, mental capacity, and the efficiency of the digestive, cardiovascular, and other somatic systems, so that what would be considered as relative impotence by one man might be looked upon as normally satisfactory performance by another. It would be a sad mistake to expect all men to measure up to the standard of the rather rare sexual athletes.

Old age, in itself, should never be the sole or principal cause of impotence, though in the vast majority of instances, the passage of the years is accompanied by a gradual diminution in the urgency of the sexual desire and zest, as well as of all others. The man who has lived into his seventh decennium or longer has given ample evidence that his body is anatomically and functionally reasonably sound, else he would have died earlier. If, therefore, he has not burned out his fires by undue assiduity in collecting the usufruct of gallantry, if his erotic technic has been intelligently developed and consistently practiced throughout life, and if his understanding, interested, and loving sex partner is still living and in the possession of reasonably good health, he should come to his last illness in the enjoyment of adequate potency as frequently as his normally diminished desire demands it.

Setting aside those cases of impotence which, though psychic in origin, are outside of the field of the average clinician, including such marked and more or less fixed aberrations as homosexual tendencies, parental fixations, sadism, masochism, fetishism, eonism, and the like, I shall discuss briefly some of the commonest causes of that relative or temporary type of impotence which is apt to afflict any reasonably civilized man after the age of forty years, and not infrequently those who are younger than that.

Causes in the Environment

Sound potency must be free from hindrances, and for the highly evolved and sensitive man, these may be of many kinds, some of which may seem utterly trivial to those who are uninstructed in these matters.

Probably the most common hindrance is *clothes*. The only proper dress for the thoroughly satisfactory consummation of the sex embrace is no dress whatever, and when such is attempted fully or partly clothed, failure is decidedly common.

An unusual or uncongenial general environment or conditions in which interruptions may occur; an uncomfortable bed or one that creaks with every motion; a temperature hot enough or cold enough (especially the latter) to obtrude itself upon the attention, or a draft blowing upon the naked and frequently sweat-moistened body; too much or too little light (some men need the sight of their mate's body to stimulate full potency, while others prefer to couple in darkness); outside noises, especially when unexpected; any circumstance which may unduly delay the performance of the act when the man is fully ready; or, in fact, any cause, no matter how seemingly trivial, which may distract the attention from the business in hand, may cause a temporary failure of potency.

The use of a condom as a contraceptive measure is, for a good many men, a partial or complete inhibitor of potency.

The radical change in environment and all the ways and business of living, which is experienced by newly married men, not infrequently gives rise to temporary impotence in bridegrooms, which may become a serious matter unless the bride is ardent and well informed.

Causes in the Man

The more highly evolved and civilized man, who earns his bread by the exercise of brain rather than brawn and who is engaged in a ceaseless struggle to gain or maintain a definite and fairly high financial, social, or political status, frequently finds himself embarrassed or sorely distressed by a more or less complete failure of his potency, which may take the form of *impotentia libidinis* (lack of desire, or frigidity), which is not so disturbing unless his wife is of a strongly amorous temperament, or *impotentia coeundi* (failure of erection or premature ejaculation).

While it has been shown that intense mental effort and concentration burn up few physical calories, the expenditure of nervous energy is great, in proportion to the intensity and duration of such effort. The performance of the act of sex also requires a considerable expenditure of nervous energy, and if a man's reserves of such energy have been drained away by the activities of the day, he has little or none remaining for those of the night. It may well be that the disproportionate fecundity which has been reported in families "on relief" is due, at least in part, to the absence of excessive mental activity and ambition.

Although the institution of the honeymoon originated long before the birth of the modern embryo science of psychology, there is evidence of a distinct, if unconscious, purposefulness in it. The man who goes away, with his bride, from the demands and stresses of his vocation; away from relatives and friends and all who may show an intrusive inquisitiveness about his doings; away from all the potentially distracting or annoying circumstances of his ordinary environment, and devotes his entire thought and attention to the woman he loves, for a month (more or less), is, so far, in an ideal position as regards his potency. Many busy men, who have been relatively impotent for months or years, have discovered that if they go away for a more or less prolonged vacation with their wives (a "second honeymoon"), their sexual vigor returns to an astonishing degree.

The next great disturber of potency, arising in the man himself is *fear*. This, in its chronic form, known generally as "worry," is closely allied to the conditions just discussed. In the married man, it frequently appears as dread of impregnating his wife, at a time when pregnancy and an addition to the family would be inconvenient or disastrous, or, especially in bridegrooms, of inflicting physical or psychic pain upon her. In the unmarried man, in addition to the constant fear of impregnation, there is the fear of contracting a venereal disease and of the discovery of his illicit relations. In all men who have had one or more embarrassing experiences of failure of potency, there is the possibility of a more or less subconscious fear of its repetition.

Allied to fear are all those relatively rare and always difficult types of psychic disturbance such as taboos, complexes, fixations, feelings of "wrong," either in the act itself or in connection with a partner who has been unduly exalted and set apart in the mind of the man. Here, also, must be classified the dread or reluctance of some men in assuming more or less unusual positions in coitus, which are necessary for the complete satisfaction of certain women.

Pain is another frequent inhibitor of potency. This may result from temporary inflammatory conditions of the penis or scrotum; from hernia; from arthritis; or from any disorder which may give rise to painful sensations in any part of the body.

Intense sex desire may totally or partially inhibit erection or cause premature ejaculation, especially in sensitive and "spiritual" men, who are also especially liable to failure of potency if satisfaction is long delayed after tumescence has reached its height.

Another interfering condition, not yet fully understood but definitely to be reckoned with in certain cases, is what may be

called short-circuiting of the sexual impulse. This occurs in men of the higher mental and emotional types who have been mated with women whose appeal was purely physical. If, later, such a man meets a woman who can satisfy all his intellectual and esthetic needs, even though his relationship with her may be kept strictly on those levels for a considerable period or indefinitely, a time will frequently come when his libido will be so fully drained off on the higher planes of consciousness, that there is none left for the satisfaction of his strictly fleshly partner.

This by no means exhausts the possibilities of causes of impotence inherent in the man himself, but should offer a sound and suggestive working basis for the study of individual cases. In fact, if physical and mental fatigue, fear (including worry), pain, psychic or physical erethism, and disturbances connected with his sex partner (which I am about to discuss) can be eliminated, the physician will do well to make a careful search for some *physical* disease, of which impotence may prove to have been the first presenting symptom.

Causes in the Sex Partner

When we come to the discussion of the part which the sex partner plays in psychic impotence, we enter the field where the causes of a large majority (in my opinion, 75 percent or more) of such cases must be sought.

The average woman, even today, has no more than the rudiments of adequate sex instruction, and the average man is little better equipped, so that when a girl marries and enters upon the most difficult and delicate transition period of her life, she finds in her sex partner, who should be her patient teacher and helper, a degree of ignorance and selfishness which makes informed physicians wonder how any marriages succeed.

To the average woman—and even to most men—the declaration that the physical expression of love is a complex and difficult art, which must be learned by a considerable amount of sincere study of the texts on erotology which are now available, and by long, intelligent, and painstaking practice, the same as any other art, comes with the shock of a wholly new and foreign idea.

One of the chief obstacles to acquiring proficiency in this art lies in the fact that its specific technics cannot be practiced alone, as can those of the graphic and plastic arts and music, but require the intelligent, loving, eager, and sympathetic co-operation of a partner. Ideal conditions for such practice are found only in the legal marriage relationship or in one closely ap-

proximating it; and even a passable degree of success definitely depends upon a fairly comprehensive theoretical understanding of the details of these technics, on the part of the man, and at least enough knowledge regarding them, on the part of the woman, to enable her to recognize their purpose and necessity.

The highest degree of expertness in amatory technics, which is one of the most important factors in conjugal happiness, can be attained only when both partners in the relationship are perfectly certain that *any act whatever*, by means of which two people who truly love each other attempt to manifest that love physically, is perfectly "normal," right, and beautiful, if it is mutually desired and satisfying.

The woman who enters upon the marriage relationship for economic or social reasons; or who, though she marries for what she calls love, has been thoroughly indoctrinated with the idea that the sexual relationship is more or less coarse and bestial and in some obscure way "wrong," even though legal; or the one who has been taught that any manifestation of amatory ardor on the part of a woman is vulgar and meretricious (and there are thousands of women in these classes), begins to undermine her husband's potency from their wedding night. In this matter, the gulf between dignified and indifferent acquiescence and enthusiastic and whole-hearted cooperation, makes the difference between thrilling happiness and bleak disaster.

But even though a union may begin in a fairly auspicious manner, it may still come to grief unless both partners are genuinely mated on the emotional and mental, as well as on the physical level, and unless the man is sufficiently unselfish and expert to make sure that his partner is fully satisfied by every embrace. This latter requirement implies a knowledge of erotic technics, which cannot be discussed at this time, but which is within the reach of any sincere student. If a man cannot bring satisfaction to his partner, she is likely to become indifferent or actually antagonistic.

The definitely intellectual and esthetic man who marries a pretty girl with little education and no ideals beyond those of the flesh, because of her powerful sex appeal, is courting trouble. Such unions are always in danger from the short-circuiting which I have mentioned, and from the outcropping of innate coarseness in the woman, as time passes, passion is satisfied, and familiarity breeds carelessness in regard to amenities that have been learned superficially.

Such a woman, when the glamor of the honeymoon has faded, begins to be indifferent as to her dress, her personal habits,

and her conversation. A sensitive man, coming home in no matter how ardent a mood, will find it cooling if his partner meets him in a dirty kimono, with uncombed hair, untended fingernails, and a run in her stocking.

This effect will be accentuated, especially when he is tired or has been worried by his day's work, if dinner is late or ill cooked, the house in disorder, and he is greeted with nagging or complaints.

Even if his libido survives these shocks, and he comes to the bedchamber with an adequate measure of eagerness, he may, and frequently does become quite impotent if the process of disrobing reveals, to the eye or to the olfactories, evidences of lack of cleanliness on the body or garments of his partner; or if she makes some coarse, facetious, or unpleasant remark during the stage of foreplay; or if, when his tumescence is fully established, she dallies unduly over her nocturnal toilet and keeps him waiting.

Even though the causes of offence are not so crass as this, the mere fact that his partner has no companionship to offer save that of the body, may have an adverse effect upon a man's libido and potency.

These comments are by no means exhaustive, but should give the physician suggestive leads as to the sort of things which should be enquired about in taking the anamnesis.

If a man of the predominantly animal type contracts an alliance with a woman of a higher psychic status, he may, especially if she is strongly sexed, retain his potency indefinitely. But a sensitive man, under such circumstances, will, after a time, almost inevitably begin to recognize his intellectual inferiority and, except in rare instances, this realization will, sooner or later, work down to the physical plane and manifest itself as impotence.

Treatment

In undertaking the treatment of a case of impotence, the first duty of the conscientious physician is to take an exhaustive and intelligently directed history and make a complete physical examination, including as many laboratory tests as are required to establish or eliminate the presence of organic causes for the disturbing symptom.

A proper history is the key to success in the treatment of impotence of psychic origin, and this cannot be obtained unless the physician has the patient's *unreserved* confidence, so that matters of the utmost intimacy and delicacy can be discussed without hesitation or embarrassment. This degree of rapport can never be attained by the medical man who treats these matters in a casual, unsympathetic, or facetious manner,

or who constitutes himself a judge to determine and comment upon the "rightness" or "wrongness" of his patient's conduct.

The second requirement in the taking of an adequate and useful history is that the physician must be sufficiently familiar with the possible causes of psychic impotence to enable him to ask questions which will lead the patient into the discussion of matters of which he may never have been consciously aware. It should go without saying that such a history as this should always be taken by the physician *himself*, and never by an assistant, no matter how competent. Moreover, no *written* notes should be made during the interview, lest the patient be seized by the fear that the most private affairs of his life are being put on permanent record, and close the door of his confidence completely and at once.

The elaborate, costly, and frequently disastrous technics of psychoanalysis are wholly unnecessary in studying cases of this sort, the necessary equipment being merely a reasonable amount of knowledge, sympathetic insight and understanding, patience, tolerance, and a fund of common sense, all of which should be a regular part of the ordinary professional armamentarium of every practicing clinician.

Having assured himself of the fact that there is no organic cause for the patient's impotence, and that no serious sex aberration exists, or arranged for the treatment of such causes if they do exist, the physician should, if necessary, supplement the history already taken by enquiring into the exact conditions and circumstances in which the failure of potency occurs, *in meticulous detail*, in order to discover whether the causes lie in the man's environment, in himself, or in his sex partner, and thus lay the foundation for intelligent and helpful advice.

If the causes lie in the environment, a readjustment should be made of amatory habits, such as the wearing of clothing, the customary time, place, and circumstances of coupling, the condition of ventilation and lighting, the amount and character of foreplay, and any other factors which can readily be changed by an act of will. An uncomfortable or creaking bed, in the home, can be remedied, or if outside, more satisfactory quarters can be arranged for. Even the place of residence of married couples should be changed, if possible, should the present home embody factors which interfere with the husband's potency.

If *coitus interruptus* is being practised, or if the condom is proving a source of annoyance, these methods should at once be discontinued and replaced by one of the far more satisfactory contraceptive technics, which any up-to-date physician should be

able to recommend and explain. The reliable spermaticides, of which a number are now available, alone or combined with a diaphragm pessary, as the circumstances dictate, can be applied by the woman, as a part of her bedtime toilet, whenever intercourse is to be expected or may possibly take place, and there will then be no unnecessary interruption of tumescence, when or if it occurs.

If the cause is found in the man himself, and arises chiefly from his general way of life, the cultured and well-informed physician may be able to suggest alterations in the regime, adapted to the individual case, which will improve matters. A reasonable amount of recreation, especially if taken with the sex partner, may, in mild cases, be all that is necessary; or perhaps a "second honeymoon" of as great length as is practicable.

In married men, fear of impregnation is, perhaps, the commonest cause in this category, and can be largely or wholly removed by teaching the wife a reliable contraceptive technic. Fear of impotence itself is generally ameliorated by a straight-forward explanation of the facts.

Impotence in extramarital relationships offers many more causes for fear, but most of these can be removed to a great extent by a frank discussion of the detailed circumstances of the case, and sound advice based upon the particular conditions.

Taboos, complexes, and other mildly psychopathic disturbances can generally be cleared up by a free and intelligent discussion of them. If not, the case should be referred to a competent and sympathetic psychiatrist. The same thing is true of cases of impotence due to intense libido or sexual erethism, and in some cases where short-circuiting of the impulse has taken place if, in these latter, the cooperation of the wife can be secured. If not it may become advisable to recommend divorce, if the condition is giving rise to serious domestic discord.

The man who is impotent because of pain, should be advised to abstain entirely from all attempts at sexual intercourse until the condition causing the pain has been relieved by appropriate treatment.

If the cause or causes of impotence are connected with the sex partner, treatment will probably be unsuccessful unless her complete and sympathetic cooperation can be secured; and the man's statement that such cooperation is out of the question should not be accepted, because the basis of the whole trouble frequently lies in his lack of understanding of and trust in his partner's powers and capacities.

In such cases, the physician should arrange for a conference with the woman,

alone at first, at which he should discuss the circumstances with her in a frank but kindly, delicate, and highly diplomatic manner. If she proves responsive, he may be more explicit, and it may be wise to have one or more conferences with the two partners together, at which information may be imparted to both of them, with the recommendation of books on erotic technic which are suited to the stage of their amatory education and intelligence. The details of the suggestions to be made and the advice to be given may be based, in a general way, upon the matters discussed in the section dealing with causes in the sex partner, but adapted, of course, to the individual case.

While it is certainly true that a coarse, stupid, indifferent or uncooperative sex partner is the direct cause of many cases of impotence, it is equally true that a loving, sympathetic, intelligent, and cooperative partner can be a great help to the partially impotent man, and it is one of the physician's duties to use his utmost endeavors to bring about such a condition of understanding helpfulness.

If all of the measures I have suggested

fail, and a separation of the partners seems unwise or undesirable for any one or more of many reasons, the man, and frequently his partner also, must be sympathetically advised and instructed how to make the most and best out of life, in the presence of conditions of total or partial impotence.

Every reasonably civilized human being should have a variety of other interests which can take the place of sex, if this partially or completely fails. If they have not, it is the duty of the physician to advise, instruct, and assist the man or his partner or both in acquiring and cultivating such interests. This, of course, is a tremendous assignment, which can be adequately filled only by a physician who, himself, has a coordinated philosophy of life, wide interests and experience, a broad culture, an unflinching sense of humor, and a deep and abiding fund of patience, tolerance, and human understanding and sympathy. Such a man can work miracles in the management of cases of impotence of psychic origin.

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The Interpretation of Pyelograms

By

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AN ACCURATE interpretation of a pyelogram is impossible without: (1) a basic knowledge of normal renal variations; (2) a systematic plan of analyzing every element in a picture; and (3) a thorough knowledge of those characteristics occurring in the various pathologic conditions of the urinary tract that are portrayed in the x-ray plate.

Normal Variations

In the normal variations, first, considering position, horizontally the renal pelvis is said to approximate or cross the twelfth rib, while vertically it touches the tip of the transverse process of the first lumbar vertebra. Normally it can deviate to a moderate degree in any direction, but should be considered abnormal if it encroaches close upon the spine, shows marked lateral displacement, or if it is below the third lumbar vertebra. The ureter, with slight variations and curves, maintains a vertical approximation to the tips of the transverse processes until it swings over the pelvic bone and assumes a lateral curve to reach

the bottom of the bladder. Normally, slight angulations and physiologic areas of broad-

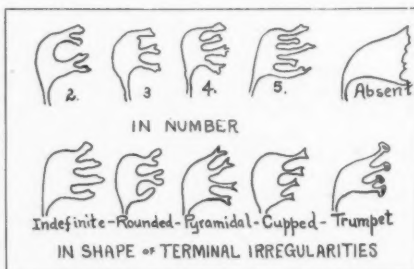


Fig. 1.—Normal variations in the major calices (sketched, diagrammatically, from pyelograms).

ening or narrowing can occur from ureteral peristalsis.

The normal renal pelvis may vary in size and contour, and while it is usually funnel-shaped, it can normally be definitely rounded, oval, square, elongated, or bifid (see Fig. 1).

Ordinarily there are three major calices, the superior, middle, and inferior. However, there may be two, four, five, or they may be completely absent, with direct communication of the terminal irregularities of the minor calices with the renal pelvis.

The terminal irregularities of the minor

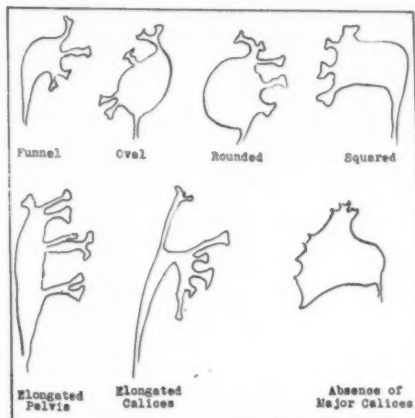


Fig. 2.—Types of normal kidney pelvises.

calices may have an indefinite shape, or may be more or less rounded, pyramidal, cupped, or trumpet-shaped (see Fig. 2).

The systematic plan of study should first be directed at the position of the kidney as shown in the pyelogram, both vertically and horizontally, this study, of course, including the position of the ureter. Then would naturally follow noting and mental recording of the contours and a cataloging of the type represented in the terminal irregularities of the minor calices, the calices themselves, each in detail, the pelvis, and on down the ureter. Comparison with the opposite kidney is desirable when possible. *Irregularities in the outlines of the entire tract* should then be studied, and *variations in the density of the medium*, comparing areas of such variations with the "flat plate." Lateral views may be necessary to clarify some puzzling outlines or densities. By an intelligent study, combined with other clinical and laboratory data, the pyelogram will usually supply us with the necessary information to obtain a correct diagnosis.

Pathologic Changes

Of the pathologic conditions which may be indicated by the pyelogram, let us first consider position. While the normal position is relative, so ptosis may be classified as of the first, second, or third degree. Braasch* states that, when the renal pelvis is seen below the body of the third lumbar vertebra, definite ptosis exists, and cites as

evidence of ptosis: "caudad displacement of the renal pelvis to variable degrees; rotation, vertical or horizontal; change in the angle of the ureter; and a tortuous course of the ureter."

Renal displacement (dystopic kidney), aside from simple ptosis, may arise from extra-renal or intra-renal tumors, perirenal abscess, spinal deformity, or trauma. Other conditions in which variations from the normal position occur are: congenital anomalies; failure to rotate; fused kidneys, unilateral or horse-shoe; duplication of the renal pelvis; and ectopic kidney.

Hydronephrosis is described as a dilatation of the upper urinary system by obstruction, and is usually characterized by *regularity of outline*, in contrast to the ir-

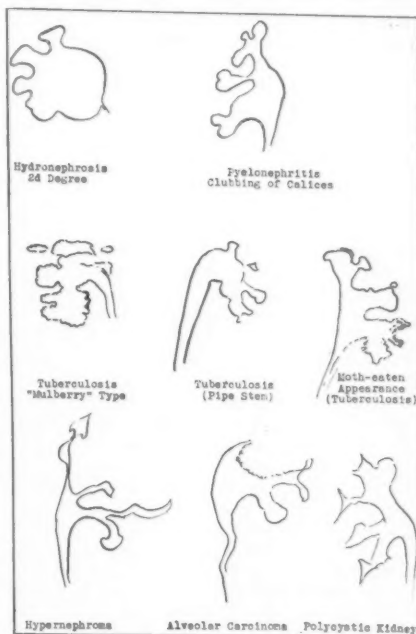


Fig. 3.—Types of pathologic kidney pelvises.

regularity of dilatation due to inflammation or tumor.

Braasch* describes three degrees of hydronephrosis, in which, in the first degree, there are: flattening of the terminal irregularities of the minor calices; broadening of the base of the calices; an increase in the size of the pelvis; and shortening of the papillae. In the second degree there are: broadening of the entire calyx; shortening of the papillae, a change in the angle of the pelvis and ureter; and a marked increase in the size of the pelvis. In the third degree,

*Braasch, Wm. F.: "Urography." W. B. Saunders Co.

he states that there occur: *extreme* dilatation of the pelvis and calices; partially filled calices; rounded, scattered areas of portions of pelvis and calices; diffuse outline of a rounded sac; and dim areas suggestive of opaque fluid in dilated areas.

The etiologic factors of hydronephrosis are: ptosis, lithiasis, tuberculosis, obstruction from anomalous vessels, obstruction in the upper or lower ureter, obstruction due to inflammation, and pregnancy.

The characteristic thing about the picture of hydronephrosis is the "bloating" effect, the contours being smooth, in contrast to the irregularities seen in pyelonephritis.

Pyelonephritis is distinguished from hydronephrosis by dilatation of the renal pelvis and ureter from pyogenic inflammation, and may result from inflammation alone, with no element of obstruction. It is characterized by variable degrees of deformity, manifested by areas of constriction and dilatation. Different types of infection may cause characteristic deformities. When the infection is predominant in the pelvis, it is accompanied by more or less dilatation of the pelvis and calices, but when it is predominant in the renal parenchyma, it is associated with cicatricial contraction, rather than dilatation, and is largely confined to the calices.

Pyelectasis from infection differs from dilatation due to obstruction in lesser degrees of dilatation; greater irregularity of outline; and predominance of dilatation in the calices.

Pyelonephritis can produce deformity in the calices or in the true pelvis, cortical necrosis, atrophy, or deformity of the ureter. The characteristic deformity is *clubbing* of the calices, and this appears early, before dilatation of the pelvis or ureter occurs.

Tuberculosis causes areas of cortical necrosis which show in the pyelogram, with irregular dilatations of the pelvis, obliteration of one or more calices, detached calices, strictures of the ureter, and sometimes areas of calcification in the parenchyma.

In the pyelogram are shown, as characteristics of tuberculosis, moth-eaten-appearing areas, or an irregular mulberry appearance of the calices. The outline of the ureter is characterized by marked irregularity, and often there is no line of demarcation between the ureter and the renal pelvis (see Fig. 3 for pathologic appearances).

Chronic pyogenic pyelonephritis usually causes a more regular outline in the pyelogram. If there is one remaining normal calyx, with others markedly destroyed, it points toward tuberculosis.

Calculi: In the study of shadows suggestive of stone, the relation of the shadow to the pelvic or ureteral outline must be

thoroughly analyzed. Also changes in the pelvic outline, due to obstruction or inflammation, should be noted. Shadows near the cortex of a kidney, if lateral to or overlapping a calyx, are extra-renal.

Lateral views are of considerable value in the determination of the origin of shadows suggestive of stone.

In most cases of renal stone there is variable dilatation of the pelvis or calices, but the degree of dilatation is not dependent on the size of the stone. The pelvis is usually dilated most, and even more markedly if the constriction is in the upper ureter.

Much of the dilatation with stones is due to infection, so that changes are often present involving evidences of hydronephrosis and pyelonephritis.

Calcifications due to tuberculosis or hypernephroma may be misleading. Gallstones are characterized by their indistinct centers, multiplicity, and position.

In the consideration of renal tumors, those occurring within the kidney are characterized by deformities in the pyelogram, but may simulate hydronephrosis, pyonephrosis, tuberculosis with calcification, or stones. Neoplasms usually produce the greatest deformities of the renal pelvis, the most extensive of which are seen in carcinoma. Some of the deformities suggestive of tumor are: elongation of one or more calices or of the pelvis; encroachment on the pelvic lumen, with flattening or filling defects; narrowing of the calices, with obliteration or occlusion; pyelectasis; abnormal position of the kidney; and deformity of the upper ureter. Elongations and deformity must be well marked to escape confusion with the normal elongated type of pelvis and calices.

The deformity of **hypernephroma** often assumes a "spider-leg" appearance, and the calices go in various directions, producing a *bizarre* picture, often with terminal tapering, hooking, or clubbing. Narrow elongations of the calices are characteristic of hypernephroma.

Alveolar carcinoma produces great deformity of the pelvis; and a marked pelvic deformity, with a short history, is highly suggestive.

Extra-renal tumors are differentiated from intra-renal by the absence of deformities in the former and their presence in the latter.

The fact that the opaque medium may be retained for hours after the pyelogram is taken is of diagnostic value in tumors.

Tumors of the pelvis cause deformity in the pelvis, but no elongation of the calices. Blood clots may simulate pelvic tumors.

Changes that can occur in a picture of **polycystic kidney** are described as: obliteration of the calices, with an oval pelvis; encroachment on the calices and pelvis;

obliteration of the pelvis; inflammatory changes; or *broad, irregular elongation* of the calices, with cupping, flattening, or crescent-shaped deformities.

While the pictures of this condition may show considerable variation, the pelvis is often *not* deformed.

Since polycystic kidney is a bilateral condition, a picture of the opposite kidney often assists in the diagnosis. Conditions with which it may be confused are: alveolar carcinoma, tuberculosis, atrophic pyelonephritis, hydronephrosis, solitary cyst, or the upper of duplicated pelvises.

Congenital anomalies which most commonly occur are: duplication of the renal pelvis, in which the upper pelvis is rudimentary and situated high; duplication of the ureter in varying degrees—complete or incomplete; fused unilateral kidney and horse-shoe kidney; congenital hypertrophy or atrophy; congenital incomplete rotation; and ectopic kidney (which is rudimentary and located within the bony pelvis).

In this connection, attention should be called to the conditions which can be associated with torsion, or a reversal of the pelvic and caliceal axis, which are: congenital incomplete rotation; ptosis; trauma; tumor displacement; fused kidneys, unilateral or horse-shoe; postoperative displacement; adhesions; and perinephritis.

Errors can arise in the interpretation of pyelograms from improper filling, producing either overdistention, with possible extravasation, or underdistention, producing incomplete filling; movements of the patient while the pyelogram is being made; incorrect angle of the x-ray tube; coiling of the catheter; barium in the bowel; and deformity from extraneous pressure.

Summary

Some of the important characteristics and high-lights of diagnosis are:

1.—In *hydronephrosis* the parts are usually *regular* in outline (in fact, smooth and "bloaty"), and changes are most marked in the pelvis.

2.—In *pyelonephritis* the picture is *irregular*, all of the calices are involved, and the condition is characterized by *deformity*, usually most marked in the calices, rather than dilatation. "Clubbing" is characteristic.

3.—*Hypernephroma* is characterized by its *bizarre* appearance and *narrow* elongation, with tapering or hooking of the calices.

4.—*Polycystic kidney* is likely to show *broad* elongation of the calices, with cupping and crescent-like deformities. The opposite kidney is always involved to some degree.

5.—*Tuberculosis* is usually attended by marked deformity of the ureter; loss of distinction between the ureter and pelvis (pipe-like); moth-eaten areas in the pyelogram; or a mulberry appearance in the picture.

6.—An oval pelvis can be: polycystic kidney; adenocarcinoma; rudimentary upper duplication of the pelvis; atrophic pyelonephritis; or a normal oval pelvis.

7.—Torsion can be due to: congenital failure to rotate; unilateral fused kidney; horse-shoe kidney; simple ptosis; or dystopic kidney, due to trauma, tumors, inflammation, or postoperative displacement.

This paper, in a general way, only outlines superficially the many factors involved in the interpretation of pyelograms. Students and practitioners desiring more comprehensive texts on the subject should refer to such monumental works as that by Dr. William F. Braasch, here quoted, and others.

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APTITUDE

It isn't what a man knows that matters, but how near to a straight line he can drive the processes of his mind; how near to a lean and useful muscle he can make that mind; how near he can come to lassoing a truth or method. No man should be judged by what he doesn't know; he should be judged only by how quickly and sensibly he assumes new duties.—STRUTHERS BURT.

THE OCEAN OF TRUTH

I do not know what I may appear to the world, but to myself I seem to have been only a boy playing by the seashore, and diverting myself in now and then finding a smoother pebble or a prettier shell than ordinary, while the great ocean of truth lay undiscovered before me.—SIR ISAAC NEWTON.

The Use of Insulin in Infections

By

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JUST what the metabolic mechanism is which operates in infections to lower carbohydrate tolerance is not entirely understood. Pollack,¹ in 1933, called attention to a large number of complications of diabetes which caused the patient's insulin requirement to greatly exceed that which had been anticipated. Infection, as well as endocrine disturbances, hepatic disease, circulatory decompensation, and fractures were mentioned. He contended that infection generally increases metabolism and is frequently associated with cloudy swelling or necrosis of the liver, which may interfere with the oxidation or storage of dextrose.

Moen and Reimann,² working with "triple typhoid" vaccine in diabetic and normal persons, concluded that the well controlled diabetic patient approaches the normal very closely in speed and amount of antigen formation. The uncontrolled diabetic patient, on the contrary, forms antigens in limited quantities and only very slowly. This mechanism may partially explain the lowered resistance of these patients. However, this does not entirely explain the problem involved in glycosuria occurring in normal individuals suffering with infections.

Janney and Shapiro³ believe there is a logical basis for the use of insulin-carbohydrate treatment in nondiabetic conditions, including prolonged infection and sepsis, involving a strain on the protein tissues. They draw the conclusion that the large amount of dextrose which disappears in the tissues during insulin activity cannot be accounted for by total combustion alone, and assume that it is converted into other material. Experimental evidence demonstrates that protein sparing is greater with carbohydrate and insulin than with carbohydrate alone. It is suggested that protein sparing is probably an expression of protein synthesis from carbohydrate metabolites. It is assumed that insulin aids in this process, probably by supplying metabolites.

It will be recalled that diabetic coma frequently occurs following acute infections, trauma, pregnancy, and other complications which exert a strain on the protein tissues. These authors believe that the breakdown of protein tissue in improperly treated diabetes may be explained as a lack of normal protein regeneration through insulin deficiency, with resultant

impoverishment of carbohydrate metabolites normally present. Acidosis, they claim, is the result rather than the cause of these processes. Impairment of protoplasmic repair may account for the tendency to infection and slow healing exhibited by diabetic patients.

Cannon⁴ calls attention to the diminution of the alkali reserve which he observed, especially in cases of infection with the gas bacillus. Bodily states characterized by lowered blood pressure and inadequate circulation are accompanied by decreased alkali reserve. As the alkali reserve falls, the respiratory rate increases, becoming very marked as the limit of the reserve is nearly approached. If the carbon dioxide capacity drops to 30 percent or lower, the breathing becomes rapid (40 to 50 respirations per minute), deep, and vigorous, in some cases, resembling true "air hunger."

Harrower⁵ called attention to the role of the pancreas in the control of infection as long ago as 1913, and mentions the difficulty encountered in pancreatectomy in combating severe or even fatal infection. Whether the resulting infection is produced entirely on account of the deficiency or absence of insulin, or whether there is a disturbance or imbalance produced in the endocrine system, would be difficult to state positively.

No information has been found regarding the influence of insulin upon the opsonic index. Blood findings are, however, recorded by King⁶ and his co-workers, who found that, under the action of insulin, there is an actual increase in lymphocytes and a decrease in the neutrophilic leukocytes.

Wilcox⁷ emphasized the point that streptococcal toxins may cause a toxic glycosuria, and suggests that this may follow an impairment of the endocrine function of the pancreas. He believes that diabetes mellitus may be caused, in some cases, by an irreparable damage to the islet tissue from oral sepsis.

Infections and Carbohydrate Metabolism

A large number of infectious diseases have been observed to produce lowered carbohydrate metabolism, as reported by Williams and Dick.⁸ They mention transient glycosuria in diphtheria, scarlet fever, typhoid fever, influenza, appendicitis, measles, infections with suppuration,⁹ Asiatic cholera,¹⁰ malaria,¹¹ sapremia,¹² lobar pneu-

monia, and acute tonsillitis.¹⁴ These authors demonstrated glycosuria in 41 percent of their patients with acute infections, when given sufficient dextrose. In some patients the decrease in carbohydrate metabolism lasted for several weeks or months. This decreased tolerance was improved by supplying exogenous insulin, in addition to the endogenous insulin secreted by the patient. It was shown that the excretion of dextrose was diminished about one-third when insulin was given, and it is believed that adequate doses of insulin, administered at the proper time, will return the carbohydrate tolerance to normal. This evidence appears to indicate that the toxemia from infectious disease interferes with either the action of, or the production of, insulin. The fact that, when exogenous insulin is supplied, carbohydrate tolerance is restored, would appear to indicate that the disease interferes with insulin production. Influenza caused the greatest carbohydrate intolerance in this series.

Evans¹⁵ and his co-workers concluded, after a series of 11 cases of oral sepsis in non-diabetic patients, that there was a slight but definite diminution in carbohydrate tolerance. This diminution of tolerance was greater in 3 cases of acute alveolar abscess than in 4 cases of pyorrhea. Dental treatment, with subsequent improvement in 5 out of 7 cases, resulted in an increased tolerance practically equal to that of a normal control, proving that oral sepsis caused the diminished tolerance. They quote from the literature¹⁶ "cases of carbohydrate intolerance in furunculosis.

As shown above, insulin improves carbohydrate tolerance and is useful in treating infections of various types, though this use has not become widespread. The results observed, to the present, have often been coincidental with the administration of insulin for some other purpose. In Barbour's¹⁷ series, treated for malnutrition, improvement occurred in 38 cases out of 40. Twenty-three (23) of these patients had infections, including acute nephritis, acute broncho-pneumonia, tuberculosis, chronic bronchitis, sinus infection, tuberculous adenitis, and syphilis, which were also improved.

Bartle¹⁸ demonstrated frequent elevation of the blood sugar in infections (furunculosis) and in severe injury with slow healing or non-union of bone tissue (burns, crushing injuries, and compound, comminuted fracture). These cases showed no glycosuria, but the blood sugar ranged between 130 and 260 mg. percent. Regulation of the diet, restricting carbohydrates, was adequate in cases having the lower blood sugar concentrations. Insulin, however, was needed, in addition to the dietary reg-

ulations, in the more severe cases. Some of the more severe cases of furunculosis were hospitalized, the diet being restricted to about 1500 calories per day. These patients also received fairly large doses of insulin (45 units per day). The ambulatory cases usually received one unit of insulin for every fifteen milligrams of blood sugar above normal, which was administered once daily before the mid-day meal. Some patients required larger doses of insulin and were given one unit for every ten milligram rise of blood sugar. Blood sugar determinations were taken once every ten days and the urine examined twice a week. When the blood sugar dropped to between 100 and 120 mg. per 100 cc., the insulin was discontinued and the patient remained on the restricted diet. After the blood sugar remained normal for a month, the patient was discharged.

Types of Cases Treated

A vicious circle is said to exist in cases of chronic suppuration prolonged by a debilitated state which, in turn, aggravates the suppuration. Ersner and Pressman¹⁹ were able to break into this cycle by improving the general metabolism with insulin and thus causing the suppuration to subside. They treated a series of 7 cases of suppurating postoperative mastoiditis. Insulin was usually started about the sixth or seventh week of convalescence, but in some cases later, when progress in healing was not satisfactory. Their method consisted of a single daily dose of insulin, given one-half hour before lunch. In children, the initial dose was 3 units, which was increased rapidly to 5 units or more, according to the patient's reaction. The appetite improved and also the general health, followed by a rapid decrease of suppuration; new granulations appeared and complete healing rapidly followed.

A case of lung abscess was treated with insulin by Beale,²⁰ with good results. The patient, aged 58 years, was first seen December 14, 1932. A tentative diagnosis of lung abscess was made on account of halitosis and a history of cough following exposure. This was verified by x-ray examination revealing a lung abscess of the central portion of the lung. *Treatment:* Creosote ($\frac{1}{2}$ oz.), given in 5-drop doses every 4 hours; insulin, 5 units once daily. On January 12, the x-rays showed marked improvement; breathing was almost normal; and there was practically no cough. On February 14 the x-rays showed only scar tissue. On April 20 the scar tissue was less than on February 14. The prescription for creosote was not refilled. Creosote and insulin were the only medications given.

Insulin and Dextrose in Diphtheria

Several clinicians have demonstrated the indisputable value of insulin and dextrose in the treatment of diphtheria. Their work was based upon data which have gradually been accumulating for a number of years. Mikami²² found hyperglycemia in rabbits which died within 24 hours after the intravenous injection of diphtheria toxin. This reached a maximum three hours after the injection, and then gradually decreased. Rabbits that received insufficient toxin to cause death within 24 hours developed hypoglycemia, and diminution of liver glycogen occurred.

These phenomena are explained by Schwentker and Noel²⁴ as follows: The diphtheria intoxication produces a profound disturbance of carbohydrate metabolism. In the early stages glycogenolysis is increased, as well as carbohydrate utilization, so that, in severe cases, a distinct hypoglycemia is evident. Liver and muscle glycogen is decreased. If the toxemia is more severe there is an increasing difficulty of assimilation of dextrose from the blood stream, and a progressive hyperglycemia results. This is thought to be due to a suppression in the production of insulin by the pancreas. The work of Mikami was later confirmed by Lawrence and Buckley,²⁵ and also Sweeney.²⁶

As long ago as 1922, Lereboullet²⁷ and his co-workers showed that a definite hypoglycemia existed in quite a high proportion of diphtheria cases. Elkeles and Heimann,²⁸ and also Schwentker and Noel, reported blood sugar curves similar to those found in diabetes, existing long after recovery from diphtheria. Hector²⁹ suggested using insulin in diphtheria in 1926. Kostyal,³⁰ Woodcock,³¹ Benn *et al.*,³² and Schwentker and Noel, have all reported favorable results with the combined antitoxin-dextrose-insulin therapy. Their methods of administration were very similar, conforming with minor variations to the following method:

Technic and Results

The patient, on admission, is given, intramuscularly, a large dose of diphtheria antitoxin (20,000 to 56,000 units). Within from a half-hour to three hours later, if there is no reaction, about 20 grams of dextrose are injected intravenously, as a sterile 50-percent solution, together with from 10,000 to 100,000 units of antitoxin and from 10 to 20 units of insulin, injected intramuscularly. The dextrose is repeated at intervals varying from 12 to 24 hours, depending upon the indications. Insulin is injected each time dextrose is administered. This treatment is continued until the membrane begins to clear or until it ceases to spread.

One case was recorded where a total of

120,000 units of antitoxin were administered. Another case received 9 injections of dextrose. It was thought best, in the early stage, to replace lost fluid either subcutaneously or intraperitoneally, rather than risk adding a load to the failing circulation. After the first or second injection the dextrose may be given as a 10-percent solution.

One series was checked with blood-sugar determinations at 10 minutes, 1 hour, 1½ hours, and 2 hours after the dextrose injection. The authors found that, the greater the lag in the return of the curve to normal, the greater the toxicosis. Some cases, showing no clinical evidence of toxicosis showed a lag in the return of the curve to normal. This lag persisted in the more severe cases for as long as twenty days.

In the series of Benn *et al.*, 89 consecutive cases were treated with dextrose-insulin therapy, and 131 similar cases were treated without it. The mortality in the dextrose-insulin group was 22.5 percent, while those not receiving dextrose and insulin showed a mortality of 35.9 percent. The percentage, in the recovered cases, of those having paresis was approximately the same. Serum sickness—rigors, collapse, vomiting, and rashes—occurred in 13.4 percent of the dextrose-insulin group; whereas the control group showed 30 percent of such reactions.

Schwentker and Noel treated only 14 patients in their series, but all of them were so toxic that death appeared imminent, and several were unconscious. Of this group, 13 recovered. In most cases the symptoms subsided rapidly and the temperature and pulse returned to normal within 24 hours after the injection. These authors believe that, in most of these cases, death would have supervened had the patients not received the dextrose. It was felt that the dextrose supplied nutrient material to a rapidly failing circulatory system. Insulin supplemented each dextrose injection, in the proportion of one unit of insulin for each 1 to 2 grams of dextrose.

There appears to be no rationale for treating late cases of circulatory failure by this method. In the early stages, on the contrary, dextrose lessens the degenerative myocardial processes, thus decreasing late inflammatory reactions. It was concluded that, the more toxic the patient, the more insulin was needed to complete utilization of the dextrose.

It would appear that this method of treating malignant diphtheria is worthy of a more extensive trial. By the lack of discomfort experienced, Woodcock was impressed by patients so treated who succumbed rapidly. He states that the patient's friends find it almost unbelievable that death is near, and he feels that the

treatment, from this point of view alone, is worthwhile. In his series, 8 out of 25 (32 percent) apparently hopeless cases survived.

The average percentage of recovery recorded in three of the series mentioned above^{21, 22, 23} is 49.1 percent. When it is considered that these are largely of the most severe type, the results are astonishingly good. It was observed that older patients responded better than the younger ones.

The action and value of insulin in the treatment of various types of infection is only partially understood. Obviously any measure which will improve the patient's nutrition should not be neglected. This is particularly important in the crises of acute infection, as evidenced by the results obtained in malignant diphtheria.

Gunn²⁴ used insulin as an accessory form of treatment in pneumonia, with benefit, as well as in chronic respiratory infections. He thinks the whole process may be one of oxidation. Spickard²⁵ believes that insulin may be of value in acute infections, and reports a case of a child with acute hemorrhagic nephritis so treated. Fancher²⁶ thinks that it should be tried in chronic infections. Fortes²⁷ reports satisfactory results in 30 out of 34 cases of pleural thickening so treated. Best results were recorded in cases of postpneumonic thickening.

Insulin was administered by Hines and Walker²⁸ in severe cases of typhoid fever, in addition to the routine treatment. They selected cases that showed no improvement after from 45 to 72 hours of regular treatment. The patients were given initial doses of 3 units, before meals three times daily. The dose was gradually increased to 10 units, depending upon the response. The diet consisted of forced fluids, including fruit juices, citrated milk, and barley gruel. After a short time the septic symptoms began to disappear, the temperature lowered, and the delirium subsided. Forced feeding by tube was no longer necessary and a soft diet was soon possible. The diet was rapidly increased to 4500 calories. The results were most satisfactory, convalescence was uncomplicated, and the patients made complete recoveries.

It would appear that infections offer a hopeful field for further investigation of the use of insulin as an adjunct to other recognized forms of treatment.

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Persistent Left Occipitoposterior Position

By

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AMONG the difficulties encountered in obstetrics, there are few more potentially disastrous than the persistent occiput-posterior positions. Nearly 90 percent of primary posterior positions rotate and deliver occiput-anterior, and with these we are not concerned. The remaining 10 percent, comprising the persistent posteriors and those in which anterior rotation is arrested before completion, will all require aid.

The early diagnosis of this condition is indispensable to the attendant. Each case must be individualized and, although a great percentage of anterior rotations and spontaneous deliveries do occur, it must be borne in mind that the case in question may possibly be numbered among the less fortunate 10 percent; thus precautions should be taken to aid nature when necessary and, if possible, secure anterior rotation, flexion, and descent with as little and as timely interference as possible.

It is believed that primary posterior positions are much more frequent than was formerly thought, the reason being that more accurate examinations reveal the true condition present, whereas much faith was formerly placed on the position of the fetal heart tones and not enough proficiency attained in abdominal palpation and rectal and vaginal touch.

In many instances an accurate diagnosis is possible from abdominal palpation alone, to be confirmed later by vaginal examination, when the cervix has dilated sufficiently to permit precise palpation of the cranial sutures and fontanels. Four maneuvers are always painstakingly carried out. They are: Palpation of the fetal head at the pelvic brim; location of the anterior shoulder; resistance of the back; and palpation of the small parts. The position of the fetal heart tones, while corroborative, is conducive to an erroneous diagnosis, if relied on to any great extent, alone.

If conditions are favorable, much may be learned from the touch picture. The amount of flexion by the height of the two fontanels; the degree of engagement by the relation of the presenting part to the spines of the ischia; the amount of dilatation and effacement of the cervix; the condition of the bag of waters; and the amount of molding of the fetal head. If the examination is made during a pain, the direction of the

internal rotation, the efficiency of the bag of waters as a dilator, and the amount and probable descent may be estimated.

Among the conditions predisposing to a posterior engagement of the occiput are: Lax abdominal walls, polyhydramnios, peculiarities of the musculature of the pelvic inlet, rigid abdominal muscles, and a pronounced sacral promontory.

The mechanism of labor in occipitoposterior positions is essentially the same as in anterior positions; namely, flexion, descent, rotation, and restitution, except that the occiput must traverse the greater arc of the circle of rotation if it is to be delivered as an anterior.

Anterior rotation may be arrested at any point in the birth canal, though posterior rotation does not usually occur until the occiput reaches the sacral concavity, which gives rise to the occipitosacral position.

In the management of these cases, first of all, watchful expectancy is the rule. An accurate diagnosis of existing conditions is indispensable. The disproportion; the deflection of the head; the condition of the fetal heart; the age and condition of the mother; the character of the uterine contractions and their frequency; the attitude of the rotating occiput, all these must be considered and frequent observations made to detect the first signs of impending danger.

Case Report

The patient, a primipara 31 years old, entered the hospital at 5:15 A.M., labor having been in progress since 2:00 A.M. The patient recalled passing some fluid at about the time of the first pains, and that was the reason for notifying me. This fluid evidently was the rupture of the bag of waters, because this structure was not in evidence at the time of the first examination. Pains were not very strong at any time.

The pelvic measurements were as follows:

Interspinal	26
Intercrural	31
External conjugate	20
Transverse outlet	11
Diagonal conjugate	12½
Rhomboid	10

Externally, in the first part of labor, it was observed that the contour of the abdomen presented a gradual slope from the xiphoid to the symphysis. The breech was in the fundus. The back was to the left side and anteriorly. The small parts were easily palpated anteriorly. The shoulder was found



Fig. 1.—Roentgenogram of the maternal pelvis and infant's head in left occipitoposterior position.

to the left side of the median line and was felt with great difficulty. The sinciput was felt above the right pubic ramus (see Fig. 1). The fetal heart tones were heard in the left flank, faintly and indistinctly. As labor progressed and the anterior shoulder rotated towards the midline, the fetal heart tones were heard more in that same direction.

Internally, and again in early labor, with the palpating finger in the vagina, it was observed that the large fontanel was on the right side and anteriorly, while the small fontanel was high up and at the left sacroiliac synchondrosis. The sagittal suture and the fontanels were thus observed in the oblique. The position was, therefore, diagnosed as a left occipitoposterior.

Uterine contractions were weak, irregular both as to time and strength, and insufficient to effect rotation. Early rupture of the bag of waters caused the head to remain high. Dilatation of the cervix was slow, because the head did not conform itself well to the pelvis, and thereby failed to press down equally all the way round upon the internal os.

During the first stage the patient was advised to remain in bed until engagement took place. As long as the head was high, it was thought best not to interfere, but to pursue a course of watchful expectancy. During this time (a period of 5 hours) the patient was observed closely, to see what she could accomplish rather than what she could endure. She was given every attention, but was not greatly relieved of her pains.

During the second stage, because of inertia and exhaustion and since labor had

come to a standstill with arrested rotation, it was found advisable to anesthetize the patient and change the position to an occipitosacral by rotating the head posteriorly with forceps to the extent of 45° and having an assistant use external manipulation to hold it in place. The occiput, thus occupying the hollow of the sacrum in extreme flexion, was forced downward and backward against the perineum. Reapplying the forceps and repeated intermittent locking and unlocking of the blades with each traction prevented serious maternal and fetal injury.

Before applying the forceps the soft-parts were manually dilated or "ironed out" (method of Piper). This facilitated extraction and minimized lacerations. An episiotomy was not considered necessary.

With each traction descent continued, with the bregma as the point of direction, until the forehead stemmed behind the pubis and the occiput passed over the perineum. The tendency toward laceration was reduced to a minimum by having an assistant use Ritgen's maneuver* just at the time of the delivery of the head, as the face appeared from behind the pubis.

A first-degree laceration occurred, and this was immediately repaired after the delivery of the placenta. The child was considerably bruised, but cried heartily.

Comment

Commenting on the outcome of this case, it may be said that an anterior rotation probably should have been attempted and would have been the proper procedure, but, due to the fact that its accomplishment would have caused serious and undue trauma, it was deemed best to rotate the head posteriorly. This procedure was accomplished, and with less trauma.

It will be recalled that the patient was delivered in a state of fatigue and, since the bag of waters ruptured at the onset of labor and three vaginal examinations were made, this procedure of delivery was considered best. The subsequent course of the temperature and the pulse rate confirmed the suspicion that the patient was infected, which might have resulted disastrously had any other procedure been attempted.

* Delivery of the child's head by lifting the head upward and forward through the vulva, between pains, by pressing with the tips of the fingers upon the perineum behind the anus.—Ed.

"GOOD OLD DAYS"

Here's to Remembered Happiness. Here's to the days when children were seen as children, and not as problems; to the days when we played games of prowess and adventure; when there were neither microbes nor vitamins; neither psycho-analysts nor mind specialists; neither supervised play nor Ethical Interpretation of Juvenile Development; and when we knew enchanted hours with knights and fairies, with witches and giants, with cats and dogs that understood, when the true faith was to believe that the end was joy and that good gifts were scattered all along our way.—CHARLES J. FINGER.

Physical and Office Therapy and Radiology

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Mechanical Foot Correction

By

ARTHUR F. KRAUSZ, D.S.P., Boston, Mass.

SURGEONS have described in medical literature their technic of lengthening shortened legs. The most successful cases reported are those in which traction and countertraction have been employed. Even in cases of paralysis, contracted groups of muscles and their shortened tendons can be lengthened by traction and countertraction. Therefore, there should be no question in the mind of any physician or chiropodist about the treatment, by this means, of hallux valgus caused by shortened tendons.

This apparatus (Fig. 1), which permits the office treatment of conditions hitherto amenable only to major surgical operations, represents a device for applying traction and countertraction—a conservative way of treating deformities of the feet, adhesions in and around the joints, shortened calf muscles, and shortened tendons of the toes. With this apparatus hemorrhage does not occur around the joints, as it may with manipulation under anesthesia, because the tolerance of the patient and his reaction to discomfort act as a safety check.

I have found that the treatment for the correction of foot deformities should not be hurried; neither should it be overdone. A gradual correction, without undue discomfort to the patient, gives the best results.

Before undertaking treatments, a careful diagnosis should be made in case of hallux valgus and hammer-toe. X-Ray studies are advisable, to determine whether there is any arthritis or bony overgrowth to prevent straightening of the joint by hand. If the toe cannot be straightened and forced into correct position by hand, because it is entirely rigid, the case should be referred for surgery, provided the patient wishes it. If the joint is per-orthopedic (a name suggested by a surgeon, to describe a condition where there is still movement in the joint), good results can be expected.

The patient should be given some idea of the time it will take to correct his deformity. I tell my patients, *in advance*, that it will take from three months to a year to obtain the desired results; that each case is a law unto itself, consequently the cooperation of the patient determines, to a large extent, the final results.

I insist, at the first visit, that the patient shall wear a straight-inner-line shoe. Then I explain that, after each treatment, I must place the foot in an over-corrected position with adhesive plaster, and must therefore have room within the shoe to hold the foot in position.

Metatarsalgia and anterior arch trouble are usually caused by weakness and spread-



Fig. 1—Mechanical Foot Corrector (Krausz).

ing of the muscles leading to the toes. I use deep vibration, reaching the interossei muscles between the toes, and make certain that all bones are in place. If not, I use the front knob on the apparatus as a fulcrum, grasping the toes with the palm of my hand, and give them a quick snap. This is done once with each treatment. Good results are obtained, even in cases of Morton's toe if a pad is placed to hold up the metatarsal head.

In subluxations and pronations, adhesions must be considered. If the foot is very stiff, these adhesions must be worked out slowly, but persistently. After five or six

treatments, one will find that the joints have loosened enough to yield to treatment on pronation.

When pain has been overcome, I employ the foot clamp and leverage rod and start rotating the foot laterally and medially, applying dorsi-flexion and plantar flexion until proper motion has been accomplished. Shortened calf muscles are always a hindrance in correcting arch conditions. By placing the foot in the clamp, with the knee extended, and gradually applying more and more tension with the leverage rod on the calf muscle group, 30 minutes at a treatment, the patient's foot stays in the desired position, without any other attention.

In hammer-toe tendon stretching, a good diagnosis will help to get better results. First of all, one must be convinced that the head of the first metatarsal and distal end of the phalanx are in approximation. If subluxation is present, that must be treated first. When the proximal end is out of alignment, it may be corrected by hand manipulation, strapping, or padding. Then start traction treatments. Satisfactory results usually appear after the sixth treatment.

Hallux valgus must also be carefully diagnosed. If the great toe cannot be straightened by hand, there may be an arthritic overgrowth, and in that case, explain to the patient how long a time it may take to correct the condition. Approximate the time, regardless of your confidence or enthusiasm.

This is not a dangerous apparatus to use. The development of a skillful technic will come through its persistent use, carefully observing the results of treatment. My associates have acquired confidence in a fairly short time.

8 Winter St.

★ Notes and Abstracts ★

The Tomograph

DIAGNOSIS OF DISEASE conditions of the lung has been enormously helped by the use of the roentgen rays. However, x-ray plates may not reveal pathologic areas in a lung behind normal structures (clavicle, scapula, ribs, breasts) or behind deposits in the lung itself.

German investigators have devised the tomograph, an attachment to the ordinary roentgen-ray apparatus, which permits

roentgenograms to be taken of the lung at different levels, so that it becomes possible to see the lung itself on the plate, although the pleural cavity may be filled with an exudate. During exposure, the tube and the film-holder move in opposite directions, the tube having been previously focused on the particular area desired.

In this way, suspicious areas may be studied closely, cavities made out definitely, soft-tissue growths identified, and abscesses definitely localized for surgical intervention.

Roentgenograms of this type resemble a "modernistic" painter's distortion of the usual chest plate, so that interpretation takes more experience. Tomography is also of value in studying abdominal and cerebral conditions. Although no remark has yet been found in the literature, it would seem to be an ideal method of localizing foreign bodies and of great assistance to the surgeon as he plans his operative approach.

R. L. G.

X-Ray Therapy of Upper Respiratory Infections*

Septic sore throat: Following a dose of from 50 to 75 Roentgen units on each side of the throat, the patient's temperature drops, the swelling diminishes, and in from three to four days the patient is cured. Similar results have been claimed for short-wave diathermy, but I believe that the x-rays are more prompt and effective.

Infected tonsils: If radiation therapy is administered by an expert and the fields limited strictly to the tonsils, dryness of the throat, fibrous bands of adhesions, and injury to the tooth buds in children do not occur. The method is safe, harmless, and free from complications. It is especially suitable for patients past middle life, with chronic valvular disease, arteriosclerosis, nephritis, or advanced arthritis. Results from irradiation are admittedly slow and often incomplete.

Roentgen rays, *per se*, have no direct bactericidal action. Their mode of action is indirect, and consists of an increased activation of the phagocytic cells and stimulation of the production of antibodies, something similar to that seen following the injection of non-specific foreign proteins.

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Ultraviolet Rays in Skin Diseases

IN VIEW OF THE CURRENT CRAZE for giving "lamp" treatments to patients afflicted with all manner of dermatoses, it is well to remember: (1) that ultraviolet rays will aggravate certain skin diseases; and (2) that these rays may actually cause skin disorders.

In the first group are the skin diseases, which *must not* be treated with these rays: *Precancerous lesions*, summer prurigo, *herpes*, *variola*, Addison's disease, *acne*

rosacea, *erythema multiforme*, *lupus erythematosus*, *xeroderma pigmentosa*, *acute psoriasis*, *acute dermatitis venenata*, *acute eczema*, *melanosis*, *albinism*, *bronzed diabetes*, *gold dermatitis*, *dermatitis solare*, *x-ray dermatitis*, and *hydroa aestivale*.

Exposure to excessive ultraviolet rays or sunlight may induce: *herpes*, *dermatitis in pellagra*, *urticaria*, *angioneurotic edema*, *vitiligo*, *erythema multiforme*, *lichen planus*, *hypertrichosis*, *hydroa aestivale*, *summer prurigo*, *chloasma*, *achromia parasitica*, and *chilitis actinica*.—S. R. MERCER, M.D., in *J. Ind. St. Med. Assn.*, June, 1938.

Uses of Low-Intensity Short-Wave Therapy

LOW INTENSITY SHORT-WAVE THERAPY has yielded remarkable results in adenitis secondary to a septic focus, and in post-herpetic neuritis and carbuncles. Masses of lymph nodes shrink down rapidly under daily short-wave treatments.—P. P. DALTON, M.R.C.S., *Br. J. Phys. Med.*, Feb., 1938.

Fever Therapy in Gonococcal Infections

FEVER THERAPY sessions of five hours duration have given early and complete relief of pain and swelling in cases of acute epididymitis, acute arthritis, and acute prostatitis of gonorrheal origin. Gonorrheal ophthalmia, if treated early, showed an encouraging number of cures.—J. A. TRAUTMAN, M.D., in *Am. J. Syph.*, Jan., 1938.

Fibrositis*

FIBROSITIS is an inflammation of the fascia, aponeuroses, ligaments, tendons and nerve sheaths. It is a very painful affection. The fibrous tissue is mainly affected, although various writers claim that in some cases it is a neuralgia of the sensory nerves of the muscles.

Stiffness and pain are present, and the latter may be intense or dull, cramplike in character. In the acute form the condition is localized, while in the chronic type a large area is affected. The pain lasts anywhere from several hours to days or even weeks, and is due to the local area of tenderness, which is the fibrositic nodule, and also to muscle spasm and the tension within the tightly bound tissue. These are extremely

**M. Rec.*, July 6, 1938.

**Med. Rec.*, June 15, 1938.

sensitive, so that the slightest touch will cause great pain. Fibrositic nodules may be palpable along the areas of tenderness. The symptoms occur more commonly in the superficial sites, as these are more easily affected by trauma and exposure. On account of the anatomic position, fibrositis is often named "lumbago" or "sciatica."

Rest will nearly always relieve pain and help the patient to improve in health. Adhesive strapping at times gives complete relief of symptoms within twenty-four hours. Removal of foci of infection is an important factor in the general treatment. Hydrotherapy or light baths give good results, especially in the acute type, while massage is of benefit in the subacute or chronic type. The gastro-intestinal treatment consists of a laxative diet and colonic irrigation. Such drugs as sodium salicylate, acetylsalicylic acid, salol, and colchicum are often effective. Various vaccines have been tried, with good results.

I have treated 18 cases by the injection of sterile milk in the gluteal region, with the following results: In 13 cases there was complete disappearance of the disability; 2 showed partial improvement; and there were no results in 3 cases.

FRANCIS S. MAINZER, M.D.

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Infrared Radiation

THE PRINCIPAL INDICATIONS for infrared radiation are: (1) Arthritis and rheumatoid conditions, neuritis, and neuralgia; in acute forms, infrared radiation (mild) may be the only means of relieving pain without medication; (2) conjunctivitis, coryza, sinusitis, otitis media (non-suppurative), bronchitis; a cold or bronchitis may be aborted by the early use of infrared rays; (3) subacute and chronic inflammatory and traumatic conditions in locations accessible to heating, such as contusions, sprains, traumatic synovitis and tenosynovitis, dislocations, and fractures; (4) folliculitis, furunculosis and extended abscess formation in the skin. Efficient infrared application may reduce surgical intervention to a minimum or make it unnecessary. It is more convenient than hot packs in the treatment of cellulitis and infections.

Infrared radiation should be used as a preliminary to active or passive exercise, massage, and ultraviolet or diathermy treatments.—RICHARD KOVACS, M.D., in "Electrotherapy and Light Therapy" (Lea & Febiger).

★ Books ★

Kovacs: Electrotherapy and Light Therapy

ELECTROTHERAPY AND LIGHT THERAPY. By Richard Kovacs, M.D., Clinical Professor and Director of Physical Therapy, New York Polyclinic Medical School and Hospital; Physician in Charge, Physical Therapy, City Hospital, New York; Attending Physical Therapist, Manhattan and Harlem Valley State Hospitals, Rikers Island Hospital and West Side Hospital; Consulting Physical Therapist, New York Infirmary for Women and Children and Mary Immaculate Hospital, Jamaica, New York, and Hackensack Hospital, New Jersey. Third Edition, Revised. Philadelphia: Lea and Febiger. 1938. Price, \$7.50.

This large (744 pages), well illustrated (307 figures) monograph is designed so that it will suffice for the instruction of the physician in the use of electric and light therapy. All phases of these treatments are considered, from their theoretical background to their application in practice, contraindications, technique, advantages and disadvantages of the various forms, and substitution of simpler forms for the more complicated or expensive types.

The galvanic current, electrophoresis, low-frequency currents, electrodiagnosis, conventional and short-wave diathermy, electroparalysis, electrosurgery, electrical injuries, ultraviolet and infrared radiation therapy are considered. Part IV discusses the use of these methods in the treatment of medical conditions, arthritis, central nervous system affections, neuritis, gynecologic conditions, affections of the skin, rectum, genito-urinary tract, eye, ear, nose and throat, bones, muscles, and tendons.

The various types of apparatus are considered and their merits discussed. The physics of therapy with these various agencies is fully covered in the opening chapters.

This volume is almost encyclopedic in scope, so that those who have not been able to follow the literature closely will have at their fingertips the most recent writings on this rapidly enlarging field of medical practice.

I have received the December and January issues of CLINICAL MEDICINE AND SURGERY, and I must say that I am delighted with the subjects covered and the intelligent, helpful manner in which they are treated. Your articles are so well written and the explanatory material so clear that I am very, very well pleased.—W. A. G., Ohio.

A Living for the Doctor

The Business of Medicine and the Art of Living



Associate Editor: Ralph L. Gorrell, B.S.M., M.D., D.N.B.

Physicians and Citizens

ALMOST ALL of the physicians in this country are also *citizens*, as well as men of medicine, and as such have a great and vital stake in the political, social, and economic activities of the people and events which are shaping our destinies, and can neglect their patriotic duty of keeping informed about and taking part in such activities, only at their own personal peril.

It is obvious to anyone who reads at all that affairs, in this and other countries, are in a highly unsatisfactory and dangerous state, and that these conditions did not come about by accident, but as a result of a deliberate and fully considered plan. The only way in which we and other peoples can circumvent such plans is to learn all that can be learned about them, and then pass on this information as widely as possible, to those who are overlooking it. It is not merely ignorance which must be dispelled, but also the childish outlook which keeps people from facing unpleasant facts in our national life and from acting upon them with the same promptness, judgment, and force that they are applying to ameliorate their own personal or business situation.

Some pertinent and undoubted facts about the present world situation are as well stated, in an editorial in *The Nation* for August 6, 1938, as we have seen them anywhere, so we are passing on these facts (separated from the obviously biased *opinions* of the editors, with which many would disagree), as a reminder to our readers that "eternal vigilance is the price of liberty." Here they are:

"Whether for better or worse, the world in 1938 is well supplied with prophets of disaster . . . Fear may not be among the nobler emotions, but it induces ordinary men to keep a wary eye on their rulers, to ask inconvenient questions in their legislatures, to threaten reprisals at the polls. And if, in the end, they are led to the slaughter, they go with their eyes open and their minds relatively free of hokum.

"In 1914, pessimism and suspicion were not common possessions. The causes of war piled higher and higher, plots and counterplots were hatched in diplomatic darkness, and war broke on an unprepared world. Not only were the people taken unaware, but so were the leading journalists and even many of the statesmen of the countries chiefly concerned . . . When the war broke it washed over successive walls of disbelief and ignorance.

"Today the situation is different. We know far more than we knew in July, 1914; and what we do not know, we suspect. The maneuvers of the powers are reported at length and honestly, at least in the countries that enjoy a free press. The experience of 1914 is still fresh enough to provide a background of disillusionment.

"But mere knowing is not enough . . . Insight alone will not prevent war. Only if we can translate our knowledge into power and our suspicions into action is there hope of checking the advance of fatal events. . . . If we fail to do so in time, disaster will come, not as the result of a lack of knowledge, as in 1914, but because those who know are divided and morally disarmed."

It behooves every physician who is a citizen of this country (most of the others are

already well informed and are taking action, in *their own way*), as a leader in his own community and in order not to be "morally disarmed," to find out exactly what is going on in this and other countries (a difficult, but possible, undertaking, because most of what one sees in the newspapers is propaganda of some sort); make up his mind *promptly* what he wants for himself,

his family and his community; communicate the facts he has learned to as many people of *his own kind* as he can reach; and then *join with others* in taking the type of action which seems best suited to bring this "Land of Feed 'em" back to its normal state of sane prosperity.

G. B. L.

★ Notes and Abstracts ★

The Capable Surgeon

THESE FACTORS are involved in the management of complicated surgical diseases of the abdomen:

- 1.—Evaluation of risk—10 percent*
- 2.—Choice of anesthetic—10 percent.
- 3.—Selection of time of operation—20 percent.
- 4.—How much is done at operation—30 percent.
- 5.—Operative technic—10 percent.
- 6.—Postoperative treatment—20 percent.

Bowers, of Philadelphia (*Pennsylvania Medical Journal*, June, 1938), states, "Surgeons handle *uncomplicated* surgical conditions, such as appendicitis and salpingitis, very well. Why? Because, in these cases, the only important factor is technic—that much-talked-about prerequisite of a good surgeon."

This enlightened viewpoint is in great contrast to that held by many of our profession, who feel that a surgeon's true worth can be readily judged by watching his nimble fingers use a scalpel and needle. They flock, by the hundreds, to operative clinics, and only by the dozen to ward rounds, where the real battle for the patient's life may be fought over a period of days.

I talked once with several general practitioners from a remote county, who were searching for a surgeon to locate in the county seat and to perform surgery upon their patients. I asked them by what criteria they expected to pick a man who would be capable of handling all types of surgery.

"Oh, we will go watch these men operate. It's easy to tell a well-trained surgeon," they answered nonchalantly.

Surgical technic is objective; *surgical judgment* is subjective and hard to evaluate.

*The percentages indicate the relative importance of each factor.

Because a surgeon can perform a fast, technically perfect cesarean section or a cholecystectomy, one cannot assume that he also knows *when to operate* and *when to stop operating*.

Will he do a simple drainage of the gall-bladder, if the patient is seriously ill, or will he endanger the patient's life by carrying out a difficult cholecystectomy? Has he the ability to perform a low cervical cesarean section, and does he know when it is definitely indicated? Does he know that the appearance of crampy pains and vomiting on the fifth to eighth postoperative day, especially following appendectomy for acute, suppurative appendicitis, may signal the onset of a potentially fatal intestinal obstruction?

Bower's tables show that the mortality of acute pancreatitis is 75 percent, if the patient is operated upon at once. If surgery is delayed over an average period of ten days, the mortality may drop as low as 27 percent (Smead).

We have learned that a delay of a few hours may save the life of a patient with intestinal obstruction who has been vomiting for a day or two. The stomach and upper intestinal tract are decompressed with the duodenal tube; intravenous injections of saline solution are administered; a roentgenogram localizes the site of obstruction, so that the incision may be placed more properly; a "quiet" abdomen is obtained by the use of spinal anesthesia; the point of obstruction is located, and the fewest possible surgical steps carried out, without trauma to the abdominal wall or viscera.

Axiom: The surgeon is an internist who operates.

R. L. GORRELL, M.D.

Clarion, Ia.

You Should Relax*

WHY ARE SO many men and women so tense muscularly that they cannot consciously relax? Either they do not know how, or some physiologic condition makes release of muscular tension impossible.

These factors bring on hypertonus: (1) Exceeding social acceptability (the "popular" person finds it difficult to relax); (2) the use of sedatives (bromides, barbitals) which reduce tension, and are harmful because they keep an individual working or playing when he is already seriously in need of true relaxation; (3) physical conditions of poor health or illness (many ill persons are labeled as "neurotics"); (4) *excessive activity* is a very constant symptom, which usually takes the form of feverish work, intense nervous excitement, and uncontrollable activity.

Because mental work tends to drive one to a stage of hyperexcitability, the intellectual worker feels alert and is inclined to scribble on sleep. *The insomnia of the intellectual worker begins in this manner*, and the cure is brought about by the use of large muscle groups in exercise. The more fully one lives, the more tension one will feel; the more tension, the more fatigue will result.

How to help yourself and others: (1) Reduce muscular contraction by sitting or laying down when possible; (2) vary the activities of your days, move around occasionally, and take relief pauses periodically; (3) limit your internal drives and forget the desire to excel; (4) set aside rest periods during the day for repose and relaxation.

JOSEPHINE L. RATHBONE, M.D.

New York City.

Tuberculosis in Medical Students and Physicians

SIXTY-TWO (62) percent of fourth-year medical students at the University of Minnesota have been infected with the tubercle bacilli prior to coming into known contact with tuberculous patients at the Glen Lake Sanatorium, as proved by a positive tuberculin test. A ten-year survey has shown a morbidity of pulmonary tuberculosis, of 2.6 percent, and a mortality rate of zero, among 526 students who were followed from one to ten years after entering practice. This survey does not suggest that tuberculosis can be considered an occupational hazard for medical students and physicians.—FRANK L. JENNINGS, M.D., in *Minn. Med.*, Feb., 1938.

**Med. Rec.*, May 19, 1938.

Cleaning Up an Abortion

A MEDICAL PRACTITIONER may be called in when an abortion has been initiated by the woman herself, or by another, to save the life of the woman from the consequences of the illegal act. *Should the woman chance to die without any confession or explanation that she herself had done this*, it is not difficult to understand how the medical attendant might be compromised in the eyes of the law and how serious consequences to him might follow.

In any doubtful case he should call for a fellow-practitioner. It is a wise precaution for the practitioner to arrange for a female neighbor of the patient, or a nurse, to be called in, so that she may be able to tell the facts of the onset of the abortion.

—JOHN GLAISTER, Barrister, in "*Medical Jurisprudence and Toxicology*" (William Wood and Company, Baltimore).

[This menace must be kept in mind. It is probably best to have a statement made in writing and witnessed by a disinterested third party or parties.—ED.]

CLINICAL MEDICINE AND SURGERY is certainly an interesting journal. Each time it comes I have a hard time leaving it alone until I get some leisure time to read it, with the result that I am peering into it between patients all day. It has a refreshing, vigorous style all its own.—E. W. C., Indiana.

★ Books ★

Harwood & Francis: Life Insurance

LIFE INSURANCE. From the Buyer's Point of View. By E. C. Harwood and Bion H. Francis. Cambridge, Mass.: American Institute for Economic Research, a Non-Political, Non-Commercial Organization. 1938. Price, \$1.00.

When a life insurance agent asks you to buy a \$10,000 policy, he is suggesting the investment of that sum of money. Therefore, the purchase of life insurance should be given as careful consideration as would be given to the investment of the face value of the policy.

This brief and simply written book will give any intelligent adult person the basis for making a sound estimate of his insurance needs and the best way to meet them. The statements made are strictly factual, impersonal, and without bias. Many physicians need the sound advice and assistance it gives.

The Seminar

"A Monthly Postgraduate Course"



(NOTE: Our readers are cordially invited to submit fully worked up problems to the Seminar and to take part in the discussion of any or all problems submitted.

Discussions should reach this office not later than the 5th of the month following the appearance of the problem.

Address all communications intended for this department to The Seminar, care CLINICAL MEDICINE AND SURGERY, Waukegan, Illinois.)



Problem No. 8 (Surgical)

Presented by J. R. Verbrycke, Jr., M.D.,
Washington, D. C.

(See CLIN. MED. & SURG., Aug., 1938, p. 388)

RECAPITULATION: A man of 29 years had scarlet fever two years ago, and afterward had "stomach trouble"—belching, bloating, severe cramp-like pain in the left hypochondrium, and vomiting, which gave relief.

On examination the whole abdomen was very tender, but there was nothing localized. There was no fever; blood studies were negative; the urine showed only a trace of albumin.

During another, more severe, attack, x-ray studies showed a greatly dilated colon, and at operation a heavy band of adhesions at the splenic flexure was removed; but a month later the patient had another severe attack of abdominal pain, just like the previous ones.

Requirements: Suggest a tentative diagnosis, *giving reasons*. What further information would you have required to make a definite diagnosis?

Discussion by Angelo A. Barberio, M.D.,
Brooklyn, N. Y.

My tentative diagnosis in this case is *tabes, with gastric crises*. I would like to know the result of the blood and spinal Wassermann tests.

A laparotomy was performed in this patient, and I take it that the spleen, kidney, and other viscera were normal. As the operation did not improve the condition, I choose syphilis, "the great imitator," as the possible diagnosis.

Discussion by M. O. Robertson, M.D.,
Bedford, Ind.

Is this patient's attack of scarlet fever at twenty-seven the cause of his condition,

or is it coincidental? What was the cause of the adhesions found at his operation? Why was there not distention and tympany at the first attack in which the Doctor saw him? To me these seem very pertinent questions.

If his condition was due to the adhesions which were present at operation, it should have given permanent relief, which he did not receive.

I am not sure whether Dr. Verbrycke means, by saying that his "blood studies were negative," that his blood counts only were normal, or that his serologic tests were also negative, but presume that the Wassermann test was not made, which I would have made at this time. It is quite possible that the condition is a gastric crisis of syphilis, but the patient is rather young for such a condition.

That the urine contained a trace of albumin, in itself, to me is not so very important. It is not stated whether blood cells were present.

Ureteral pain is usually referred to the genitals and thigh, and not to the upper abdomen, but an x-ray study should be made of the urinary tract, especially as regards calculi. I would expect to find the cause of his trouble in the left kidney, and that the abdominal symptoms were sympathetic. On this premise I would only relieve the pain during the attack, until the urinary study was made.

Discussion by R. Smith, M.D.,
Dundas, Ontario, Can.

The history of this case lacks detail. The stools should have been examined for occult blood. The temperature, as in most previous cases in the Seminar, is not satisfactorily reported. An A.M. and P.M. temperature record should be given, for it

might be normal in morning and up in the afternoon.

From the history given it would appear that the patient is suffering from multiple ulcers of the colon in the region of the splenic flexure, brought about by his previous attack of scarlet fever or some other blood-stream infection. The severe pain is the result of pin-hole rupture of the ulcers into the peritoneum (local peritonitis). This would account for the partial obstruction from bands of adhesions, found at the time of the operation. It would appear as if the same condition is again taking place.

I would suggest as treatment absolute rest and confinement to bed; rest of the bowels, giving small amounts of plain water as enemas, if necessary for movements every second or third day; a Sippy diet of milk, cream, eggs, etc.; and bismuth, grs. 20 every four hours. Four to six weeks of this treatment should be kept up unless symptoms of acute obstruction should manifest themselves, in which case one would have to resort to further surgery.

Discussion by Howard P. Benjamin, M.D., Omaha, Nebr.

My tentative diagnosis is *chronic gastritis* with acute indigestion. I am unable to diagnose this case positively from the information at hand, and without doing so I can suggest no treatment.

There is no report of a gastroscopic observation, which might be helpful.

A "trace" of albumin, in the urine means little without concomitant symptoms; yet red blood cells and "gravel" would mean much, if found.

Vomiting that brings relief indicates a gastric lesion, gallbladder disease, intestinal obstruction, appendicitis, or kidney colic.

In diagnosing this case, rupture of the diaphragm and left-sided appendicitis should be kept in mind.

There is no mention of a thorough exploration of the abdomen at the time of operation.

Discussion by Charles L. Coyle, M.D., Marshfield, Ore.

The history leads me to believe that the patient has had a recurrence of his adhesions. As no cause was assigned for the original adhesions, we must consider the cause now. My first guess is cancer of the colon. Other possibilities are: cancer of the stomach, ulcer of the stomach, tuberculous peritonitis, non-tuberculous peritonitis, and adhesions caused by inflammation of the spleen, due to scarlet fever. Intussusception and volvulus must be considered, as well as inflammation of Meckel's diverticulum. One might even consider such a rare phenomenon as a left-sided appendicitis.

The treatment is another exploratory laparotomy; but if the patient could be quieted with morphine and atropine, I should like to try a few diagnostic procedures first.

I should like to pass a sigmoidoscope as far up the bowel as possible, to look for cancer or ulcerative colitis, or other condition that might cause obstruction. I should like to give a barium enema, to reveal any obstruction or dilatation of the colon or diverticula or other valuable information, such as motility or lack of it, or spasticity. I should like to do a Mantoux test and, if it were positive, make a roentgenogram of the lungs for a primary focus of tuberculosis. I should also like a urinalysis and a Kahn test. These procedures should give me a hint as to whether the condition is due to cancer of the colon or rectum, diverticulitis, ulcerative colitis, tuberculous peritonitis, diabetes, renal disease, or syphilis. If the patient had a complete remission I should try a gastric analysis, to check the possibility of a gastric lesion (ulcer or cancer). If he was not relieved by morphine and atropine, I should omit all the above procedures and operate.

I should prefer a spinal anesthetic, since the patient is prone to develop adhesions and this method gives better relaxation of the abdomen and bowel and allows one to work more gently. I should make a large, midline incision, so as to be prepared to work in any part of the abdomen. I should first find the adhesion and cut it and then try to find the cause. If it were a cancer of the colon, colostomy is indicated. It is impractical to plan much more in advance than the incision, in an exploratory laparotomy. The rest of the steps that must be taken will depend upon what condition is found on opening the belly.

Solution by Dr. Verbrycke*

A flat roentgenogram was taken, which showed a small left renal calculus, located almost directly posterior to the portion of the colon that had been operated upon. Removal of this stone resulted in complete and permanent cure.

Query by Dr. C. L. Coyle, Marshfield, Ore.

THE DIAGNOSTIC Problem No. 6, presented by N. Odeon Bourque, was a very interesting one. However, Dr. Bourque did not tell us quite enough about the solution of the case. He did not say whether the woman was delivered at term or had a premature labor or cesarean section. Could Dr.

*Adapted from *Urol. & Cut. Rev.*, May, 1938.

Bourque be induced to give a few more details?

Reply by Dr. Bourque

IN ACCORDANCE WITH THE REQUEST OF Dr. Coyle, I am pleased to report further on Problem No. 6, presented by me.

The Doctor is correct in his statement that the case was interesting. I presented it simply as a diagnostic problem, as there were factors confusing the diagnosis. The most significant diagnostic signs were:

- 1.—The persistent *colic* (simple colics do not persist more than six hours).
- 2.—The drainage following the appendectomy, suggesting adhesions.
- 3.—Absence of rigidity.
- 4.—Persistent vomiting.
- 5.—The presence of 30,000 leukocytes, with only 74 percent of neutrophils.

When the abdomen was opened, two bands were constricting and congesting the bowel. They were severed with some difficulty, owing to their position being located behind the gravid uterus. At the time, I advised cesarean section, but this was refused. I am of the firm opinion that, in such cases, when the child is viable, cesarean section should be done as a routine.

The patient reacted perfectly and was on the way to recovery when, on the seventh post-operative day, labor started. At this time I was not called, but the obstetrician in charge of the case decided on a high-forceps delivery, which was successfully performed, but the patient had a stormy convalescence. Several blood transfusions had to be given. It is my opinion that, had a cesarean operation been done at the time of the laparotomy, much trouble would have been saved.

Problem No. 10 (Medical)*

Presented by G. R. Kamman, M.D.,
F.A.C.P., St. Paul, Minn.

A WHITE MAN, aged fifty-four, was taken to a hospital with fractures of the right femur and tibia, suffered in an automobile accident. There was a history of chronic alcoholism.

The fractures were reduced under ether anesthesia and a spica cast was applied. The immediate post-traumatic course was uneventful, but on the third day, the patient developed signs of delirium tremens. He was given 20 grains of sodium bromide five times daily, and occasional hypodermic injections of morphine ($\frac{1}{4}$ gr.).

He became semi-stuporous, progressively more noisy and disturbed, and developed hallucinations of sight and hearing. He was disinclined to eat and his feeding was neglected. The more disturbed he became, the more bromide he was given. After ten days, his condition had become serious and I was asked to see him.

The patient was semi-stuporous, noisy, incoherent, restless and in full restraint. The eyelids were heavy, the eyes glassy, the breath fetid, and the tongue furred. Speech was slurring. When the patient attempted to reach for anything (restraints were removed during the examination), it could be seen that his arm movements were ataxic. All tendon reflexes were abolished, but there were no pathologic reflexes. The temperature varied between 100° and 102°F. Examination of the urine and blood showed no abnormal changes. The diagnosis was based on clinical grounds.

Requirements: Suggest the tentative diagnosis and treatment, giving reasons. What further information would you require to make a definite diagnosis?

*Adapted from Minn. Med.

SYMPTOMS OF SUCCESS

When the machine-tender observes that he is frequently changing his point of view; when he notices that what he regarded as the kernel of the difficulty yesterday has sunk to a triviality today, being replaced by a fresh phenomenon; when he arises one morning and, by means of a new, unexpected glimpse into the recesses of the machine, perceives that hitherto he has been quite wrong and must begin again; when he wonders how on earth he could have been so blind and so stupid as not to see what now he sees; when the new vision is veiled by new disappointments and narrowed by continual reservations; when he is overwhelmed by the complexity of his undertaking—then let him enhearten himself, for he is succeeding. The history of success in any art—and machine-tending is an art—is a history of recommencements, of the dispersal and reforming of doubts, of an ever-increasing conception of the extent of the territory unconquered, and an ever-decreasing conception of the extent of the territory conquered.—ARNOLD BENNETT, in "The Human Machine."

Clinical Notes and Abstracts

★

Sterilizing Diluting Fluid

THE OBJECT of this paper is to present a new method of sterilizing diluting fluid, which has been very helpful to me and to others who are informed of this procedure.

The method generally used in sterilizing diluting fluid for extracts, vaccines, and other substances to be injected into the body is as follows: The diluting fluid, whether distilled water, physiologic saline solution, Coca's fluid, buffered saline solution, or other fluid used therapeutically, such as solutions of magnesium sulphate, etc., is usually put in a flask and then placed in the autoclave. After sterilization has been completed, the fluid must then be transferred to the various smaller containers in definite quantities, under sterile precautions. During the transfer of the fluid from the autoclaved flask to the smaller containers, great

care must be exercised to prevent contamination. I have devised the following method to overcome this danger of contamination:

The unsterilized fluid is transferred to the containers in the desired quantities and stoppered with ordinary rubber ampule-vial stoppers. The air is then removed from the stoppered containers by the use of a 20-gage needle, attached to a 10 or 20 cubic centimeter syringe, or by attaching the needle to a rubber hose which, in turn, is attached to the ordinary suction filter pump affixed to the sink faucet. The air is withdrawn until bubbles begin to form in the fluid.

Two metal lids (A) are then used, which have a one-half to one-inch downward extension or flange along their edges, at right angles to the surface. Six stove bolts (B) are placed through six

openings (C) in the margins of the lids, after the stoppered bottles (small glass vials, of known capacity, are ordinarily used) containing fluid under decreased pressure have been placed upright, between the two lids. The bolts are then fastened and drawn tight by means of wing nuts (D) screwed to them. The photograph shows (E) the vials firmly clamped between the two metal plates.

In order to prevent the rubber stoppers from sticking to the metal lids after the autoclaving, it is advisable to place a thin cloth or hand towel between the rubber stoppers and the metal lid.

The lids may be of any desired size,

depending upon the needs of the particular laboratory or individual physician. A gross or more of the ordinary 10 cc. homeopathic vials are autoclaved in our laboratory at one time. This means of sterilization does away with the chance of contamination of the fluid, because there is no need to expose and handle it after autoclaving.

This method has been used successfully since early in 1934, when this method of sterilizing diluting fluid was demonstrated to those clinicians attending the Allergy Clinic at the Cincinnati General Hospital.

J. B. BIEDERMAN, M.D.

Cincinnati, Ohio.

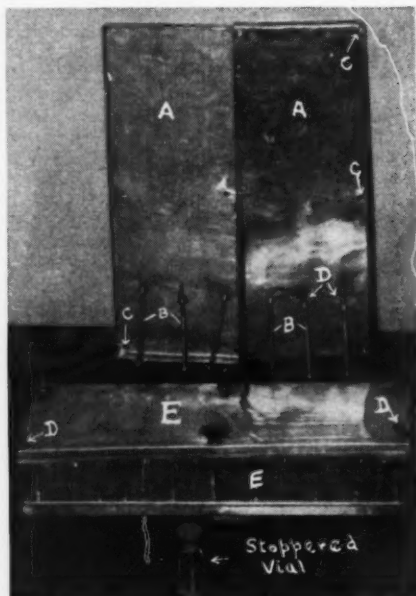


Fig. 1:—Showing the apparatus and set-up for sterilizing diluting fluids.

Ignorantio Hominis*

(Case Reports)

Case 1:—C. B., female, age 46, highly intelligent, but utterly ignorant of the laws of life and health. She believed that the night air was poisonous; she knew that sunlight would take the roses out of the bedroom carpet, but did not know it would put them in her cheeks; she knew what to feed the chickens and stock, but did not know what to feed herself and family; she worked too hard, became run down, and took patent medicine to build up. She died of tuberculosis, the doctor later said, but just between you and me she died of *ignorance*—deep, dark, Medieval, Egyptian ignorance.

Case 2:—D. L. B., female, age 9 months, a very bright, blue-eyed, curly headed baby, very sweet, very lovely to cuddle and kiss, very charming with her pretty ways and baby babble. She was the only grandchild of Case 1, described above. When Case 1 was at the point of death, the family all came in and gathered about the bed. The child was fondled and kissed, for who could deny a dying woman her last request? Five months later the child died. It died of tuberculosis. No! It died of *ignorance*—pitiful, unthinking, shallow-minded ignorance.

Case 3:—V. P., male, age 17, intelligent, the only child of well-to-do parents, a young man of some promise. His fond father allowed the stable to become a breeding place for mares; his doting mother allowed these same mares to contaminate his food after they had visited the wretched privy in the back yard. The pigs on the farm had been immunized against hog cholera, but the lad had not been vaccinated against typhoid. The death certificate says he died of typhoid, but just between us girls, we know that he died of *ignorance*. Yes, he died of *ignorance*—dirty, filthy, stinking, careless, ignorance.

Case 4:—M. O. R., female, aged 33, married and the mother of five children, all under the age of twelve. She became pregnant but did not consult her physician; she did not have her urine examined; she did not have her blood pressure taken; she did not know what she should eat, or that she should drink a great deal of water; she did not know a great many things a woman in that condition should know. She thought she would get by as she had done before. Finally the doctor was called because she was having convulsions. The mother and the baby both died. The doctor said it was eclampsia; the neighbors said it was too bad about the children being left, but it was just to be that way; the minister at the funeral said it was the Will of God; but

we know that it could have been prevented, and that the real cause of death was *ignorance*—plain, old-fashioned ignorance.

Case 5:—Infant M., age ten days. This child was born of a good woman who did not know anything about venereal disease. Oh, my, no! Her husband had, as a young man, contracted gonorrhea and had not been adequately treated, because he believed it "was no worse than a bad cold." The wife got the disease but did not know what was the matter and so was not treated. The baby got the germs of this terrible disease in its eyes, but the doctor was not called at first because the family thought that the child's eyes were sore only because it had looked at the light too soon. The child did not die, it only lost its eyes; it was hopelessly, permanently, totally, blind. The family says it was born blind, but we know better. It was blinded by a pernicious combination of sin and *ignorance*, the two archenemies of the human race.

Case 6:—R. P. R., female, age 58, highly intelligent. She had passed the change of life thirteen years before, but she now began to bleed from the womb. At first she said nothing at all about it; then she consulted her husband, who insisted she go to the family physician. She hesitated because she was afraid that he would make an examination, and that he might want to do a surgical operation. So she waited. Then she went to a quack doctor who was so good that he could tell what was wrong with her without an examination, and could guarantee a cure. Some doctor! He diagnosed the case as falling of the womb and gave her pills for it. Imagine! She got worse; she finally had to have an operation—a very extensive one, because it was delayed—but she died anyway, and it is said that she died of cancer of the womb. But cancer of the womb in the early stages is highly curable. She died of *ignorance*, as countless thousands of other good people have died before her.

Why, may I ask, had not the medical profession taught her that which was far more essential to life and health than pills, and tinctures, and fluid extracts? Why had not the school taught her the laws of life and health, as well as the laws of grammar and arithmetic? Why had not the Church, the State, the Press, the Society for the Prevention of This and That, and a dozen other agencies which make large and diffuse claims that they are educational institutions, taught her that which would have saved her life? She could have learned, if given the opportunity. But ignorance of law excuses no one, and it doesn't make a whit of difference whether the law be civil or natural.

Time was when ignorance was considered

*Reprinted from *Bul. Ind. St. Bd. of Health*.

as synonymous with virtue, but those days must go. Their passing is long overdue. Ignorance is a dirty, diseased, despicable old hag; her gaunt and haggard frame is clothed in rags reeking with filth and slime; her skin is unbathed, her mouth unwashed, her hair unkept and a snarl, her mind, undeveloped and enslaved by superstition, lies prostrate in a dungeon to which truth and vision are eternally strange; her feet are shackled with fetishes and taboos without number, but her hands reach out and engulf the world in their clammy pestilence-bearing and death-dealing clasp. She claims to be akin to holiness, and virtue, and purity, and yet is vile, ugly, and reeking. She is the twin sister and the inseparable companion of sin. Or is she but another form of sin?

Beyond doubt, ignorance is by far the commonest cause of death. It may work in a thousand forms, and wears a different mask for each case. And yet, in this twentieth century, there is so little excuse for it! *Ignorantia hominis*—human ignorance—and not tuberculosis, or syphilis, or anything else is "Captain of the men of Death."

THURMAN B. RICE, M.D.

Indianapolis, Ind.

Clinical Diagnosis of Pneumonias

SEPARATION OF THE PNEUMONIAS into lobar and bronchopneumonia is not always possible clinically, and may be difficult at the postmortem table. The differentiation of one from the other loses much of its significance in view of the importance of the pneumococcus as the inciting agent in both.

A large proportion of lobar pneumonias are typical cases, and in these the diagnosis can be readily made. There is often a history of a preceding mild acute respiratory infection, such as accompanies a cold. The onset of the pneumonia is commonly abrupt, with pain in the side, cough, and a chill or chilliness. The dry cough rapidly becomes productive, and the expectoration becomes rusty and tenacious. The temperature rises rapidly and may reach 102° to 104° F. within a few hours.

Within the first twenty-four hours, there may be no physical signs, or one may find slight dullness, diminished and bronchial breathing, and fine, moist râles. By the second or third day, examination reveals limited motion of the affected side, dullness, bronchial breathing, increased voice and whisper, and increased tactile fremitus. A polymorphonuclear leukocytosis is present in over 90 percent of the cases, occurs as early as the chill or a few hours later, and

persists throughout the disease. The roentgen-ray examination confirms the physical examination findings and demonstrates central or multiple involvement not otherwise found. *Involvement of more than one lobe or spread of the disease process are indications for increasing the doses, in patients treated with the specific antiserum.*—"Pneumonia and Serum Therapy" (The Commonwealth Fund, 1938).

Treatment of Bronchiectasis, Lung Abscess, and Tuberculosis by Postural Drainage*

POSTURAL DRAINAGE is simple, safe, and always available. It should always precede the more radical measures, such as phrenicotomy, artificial pneumothorax, lobectomy, bronchoscopy, and surgical drainage, in the treatment of bronchiectasis, lung abscess, tuberculosis, and empyema with bronchopleural fistula.

Success with this form of therapy demands that there be free drainage from the lesion into a main bronchus, and is greatly enhanced when the lesion is located in the lower two-thirds of the lung. Abscess and bronchiectasis of the apices have proved intractable, in spite of the fact that it appears simpler, mechanically, to obtain drainage from an upper lesion.

Many cases of bronchiectasis, if not too far advanced, make a complete recovery if postural drainage is used carefully and correctly over a long period of time. Even the most advanced cases are improved by the daily evacuation of foul sputum.

In tuberculosis, gravity drainage can assist in clearing the bronchial passages of sputum, thereby concentrating the coughing to a relatively brief period. Basal, thick-walled cavities may collapse after two hours of postural drainage daily. Some of the most dramatic results in my experience have been on patients that appeared too sick to tolerate any manipulation whatsoever.

The technic: The patient is placed in such a position that the affected area will drain by gravity. If the lesion is located at the base, the patient is instructed to hang over the side of the bed for five minutes several times the first day, with the thorax as nearly perpendicular as possible. Each day the time is increased by several minutes, according to individual tolerance, until three or four hours daily are spent in the perpendicular position. After the patient has become accustomed to the procedure, the drainages may be consolidated into two or three periods of one or two hours apiece.

*Dis. Chest, Aug. 1938.

The patient should be trained to sleep upon the back, abdomen, or affected side, in order to prevent spread to the unaffected lung.

Special inexpensive beds may be constructed which will tilt the patient up and down and sideways, so that any part of the lung may be drained.

PAUL HOLMES, M.D.

Toledo, Ohio.

Histamine in Psychic Disorders

A GROUP OF 30 PSYCHOTIC PATIENTS (manic-depressives and schizophrenics) and 5 psychoneurotics, was treated with subcutaneous injections of a 1:1,000 solution of histamine phosphate, given on alternate days, beginning with 0.1 cc. and increasing the dose by 0.1 cc. at each injection until 1.0 cc. was given.

Of these patients, 18 (51 percent) showed definite improvement (less apathy, and more interest in their surroundings and co-operative spirit, maintained for at least two months). In a control group of 12 patients, given beef peptone solution, only 2 (16.6 percent) showed any improvement.

Histamine phosphate may be a modified form of shock treatment, appears to be harmless, and can be given to ambulatory patients. Further studies along this line seem to offer hopeful possibilities.—DRS. WALLACE MARSHALL and JAMES S. TARTWATER, in *J. Nerv. & Ment. Dis.*, July, 1938.

The General Practitioner and Tuberculosis*

THE MASSACHUSETTS Health Commissioner has stated that tuberculosis is "A public health problem, pure and simple," and that "there should be no tuberculosis in fifteen years."

I doubt the truth of this statement, because it makes no mention of the general practitioner, upon whom the burden of after-care rests. A tuberculous patient must be watched until he dies of old age or from some other cause.

I am much more interested in the patients' health, one, five, and ten years from now, than I am in their present condition. The "danger period" begins immediately after discharge from the sanatorium, or after they are "cured" (a word that should never be used in connection with tuberculosis).

Tell the patient: No matter how long and how many times the sputum has been found free of tubercle bacilli, they may appear at any time, especially after a cold or

**Dis. Chest*, July, 1938.

"grippe"; not to kiss or fondle children or to sleep with them; to have all the members of his family receive the tuberculin test and to have roentgenograms made of those persons who respond positively; to return to work gradually; not to engage in an occupation requiring exposure to dusts, heavy physical labor, or long hours.

The patient should not be fattened up so that he will carry around an extra load of twenty or thirty pounds. His weight should be slightly more than that of a healthy person of his age and height.

JOHN B. HAWES, M.D.

Boston, Mass.

Treatment of Gonorrhea without Sulfanilamide

THE TREATMENT of gonorrhea seems to be rapidly changing into the more or less judicious administration of sulfanilamide, and only time will tell us the end result of this method of treatment.

I have been treating this condition successfully for a good many years, and have not felt called upon to resort to this new method until time has solved the uncertainty. When this uncertainty has been cleared up, the new method will be accepted at its then-proved worth.

A number of years ago, the bad results of the old method of wrapping the penis, and thus retarding drainage, admonished me to discontinue the practice and to apply a towel, tied around the body and pinned, wide open, to the underclothing. This towel was folded once in the middle; two corners were then tied with a strip of bandage and this bandage tied around the waist; the two opposite corners were pinned, respectively, to each side of the underclothing, permitting drainage into the fold of the towel.

With this instruction to the patient, he was further told to wash the penis with soap and water three or more times a day—in fact, at every chance he had—to prevent any gumming of the meatus. He was then instructed as to diet, with no irrigation or injection until the subacute stage was reached.

For years I tried the vaccines, with but little satisfaction, but finally I adopted the following prescription with the technic as described. I am not giving this prescription in full, for the reason that the purest of drugs must be used and it is now being put up commercially as Creophosphomensalin, but it contains ferric phosphate; beechwood creosote in lime water; and methenamine. This mixture was given in 5-cc. doses, intravenously, and rapidly increased the leukocytes and, at the same time, weakened the invading organisms until the gonococci were greatly diminished and the subacute stage was rapidly reached.

Owing to the fact that hydrochloric acid

is a normal body constituent, after five daily doses of the preparation just described, I changed to HCl (1:1,000 solution, in 10-cc. doses, intravenously), and continued, twice or three times weekly, alternating with Colloidal Mercury Sulphide (Hille), in 1-cc. doses, also intravenously, during the course of the treatment.

After the subacute stage was reached, I felt safe in starting my irrigations, and the injections by the patient. These were of 1:1,000 hydrochloric acid, as many feel, including Dr. Burr Ferguson, of Birmingham, Ala., that it is the most effective germicide we have, and with this injection and irrigation I saw the infection rapidly diminish until the case was entirely cleared up, expression of the prostate yielded no evidence, and the discharge from the urethra was nil.

This has been my method and, with two exceptions, one of which continued five months and the other for seven, I have seen rapid and complete recovery. One of these patients had been married one week and slept with his young wife nightly, and the other was a man who was on his feet ten hours daily, but they finally cleared up entirely.

The Creophosphensalin not only has cleared up my gonorrhea cases entirely, but I use it wherever a case of acute infection is evident and, without exception, the results are highly satisfactory. The leukocytes and phagocytosis are increased fifty percent within thirty minutes, and the invading organism, of whatever nature, seems to be weakened. This is especially true in pneumonia, which responds promptly, if the patient is seen within twenty-four hours of the onset.

CHAS. P. COPELAND, M.D.

Atlanta, Ga.

Picrotoxin in Barbiturate Poisoning*

BARBITURATE POISONING, either as a result of suicide or following the use of barbiturate preparations (Nembutal, phenobarbital, Evipal, Amytal, Pentothal, etc.) for anesthesia, may be combatted by the use of picrotoxin injections. The dose given to patients in deep coma is 9 mg. every ten minutes, until a total of 45 mg. has been given intravenously. The drug is best given in divided doses, the size and interval depending upon the degree of depression and response of the patient. Single doses may vary in size from 3 to 12 mg.

Overdoses of picrotoxin lead to overstimulation of the spinal cord, without restoring control of the brain, so that we are satisfied to produce, as rapidly as is safe, a decrease of the coma, and to push stimulation to the point of spontaneous movements. This combats circulatory stasis, prevents

aspiration, and decreases pulmonary complications. Until this stage is reached, intravenous administration is indicated; intramuscular injection can then be used to sustain the effect.

An accidental overdose of picrotoxin results in convulsions. If they do not disappear within two minutes, a slow intravenous injection of soluble barbiturate preparation (Nembutal, Evipal, Pentothal) should be given, although I have not found it necessary as yet.

RICHARD KOHN, M.D.

North Chicago, Illinois.

Chronic Infection of the Pharynx*

THE HIGH INCIDENCE of chronic pharyngeal infection would receive more attention, were it not for the fact that the pharynx is apt to be ignored once the faucial and pharyngeal tonsils have been removed. A focus of infection is thus neglected.

How do these infections begin? Posterior drainage from the sinuses bathes the pharyngeal wall and alters its structure. Purulent material is coughed up from the bronchi and lungs. Nasal obstructions are important predisposing factors.

Adults are apt to attribute the throat symptoms to "catarrh" or sinus disease, as the hypersecretion from the stimulated mucous glands may be mistaken for drainage from the posterior sinuses. A dry hacking cough, and even slight hoarseness, may be noted during the more active stages. The pharynx may be injected and coarsely nodular or velvety, but as the glandular function is impaired, the surface becomes dry and glazed. Lymphatic-cell aggregations appear at irregular intervals. Purulent, cheesy material is retained in the tubular glands and presents the appearance of small, yellow-white, pin-point areas. Enlarged blood vessels extend across the posterior pharyngeal wall.

Treatment: Local sprays or applications, cauterization, vaccine therapy, and ultraviolet-ray therapy have failed to produce consistent results. Roentgen-ray and radium therapy are effective upon the lymphoid tissue, but result in a permanently dry pharynx, due to glandular atrophy.

The oral administration of iodides appears to arrest the formation of fibrous tissue and to dissipate it slowly. The lymphoid nodules may be carefully electrocoagulated.

H. P. SCHENCK, M.D.

Philadelphia, Pa.

*J. A. M. A., July 30, 1938.

*Penn. M. J., Apr., 1938

A Handle for Rubber Stoppers

THE advantages of a rubber stopper having a head are obvious to anyone who uses crustic solutions and who knows, in addition, that the orthodox way to remove a stopper from a reagent bottle is to grasp the head of the stopper between the index and second fingers with the palm upward so that the stopper is held in that hand while the required amount of solution is poured out.



Courtesy of Fisher Scientific Co.

The new Fisher Stopperhead can be attached to any one of fourteen different sizes of rubber stoppers.

In this way the stopper and bottle are held in one hand and the container into which the solution is being poured is held in the other. Two hands do the work of three and the stopper is literally "at hand" and in no danger of contamination, as it would be if it were laid on the bench top, and at the same time the bench top is spared.

The Fisher people have devised a head or handle (pictured here), made of a special plastic and held in place by a pure-nickel screw, which will fit any one-hole rubber stopper from size No. 0 to No. 13, inclusive, and can be used, not only for bottles containing caustics, but wherever the material in the bottle will not attack nickel.

Alcoholism*

IT HAS BEEN said that the alcoholic is never cured until he is dead. This statement is true, if the author intended to signify that *an alcoholic can never learn how to drink in a controlled manner*. The answer to the question, "Can I learn to drink in moderation?" is emphatically "No!" We would rather say, with a wealth of material to back up the statement, that an abnormal drinker is cured as long as he *never again takes anything to drink*. A doctor of our acquaintance, who worked in a sanatorium devoted to the treatment of addict patients, once remarked, from the years of his experience: "I don't believe that a man is cured until he can, not only visualize go-

ing through life without alcohol, but can feel confident that St. Peter's proffer of a welcoming cup of heavenly ambrosia would be automatically turned down on the suspicion that it contained alcohol."

There is much psychologic significance in this statement, and, therefore, treatment should be devoted to bringing about a state of mind wherein the patient can visualize going through life in a happy, contented frame of mind without alcohol.

Without being conscious of it, the patient will often approach the addiction therapist with the idea that he can be cured with little or no effort on his (the patient's) part. This attitude is a throwback to the one prompted by alcohol—a state of mind in which he thought he was getting something for nothing. In consulting the therapist, he is unconsciously seeking the same thing—someone who will cure him while he sits passively by on the side lines, in a critical frame of mind. He comes, wishing to be dependent on the therapist, and to share the abnormality of his drinking with him. More than anything else, he wants someone to bear the burden for him. Hence, it is doubly important to insist that the patient accept the full measure of the responsibility of his attitude toward the treatment. It is his game, and he cannot play it from a side-line bench.

EDWARD A. STRECKER, M.D.

FRANCIS T. CHAMBERS, JR., M.D.
Philadelphia, Pa.

The Prevention of Puerperal Sepsis*

RECENT WORK indicates that the majority of cases of puerperal sepsis are caused by hemolytic streptococci of Group A, which are not those found normally in the vagina. Group A streptococci occur mostly in the diseases of the nose and throat. They do not occur in the feces of a woman who is healthy, and they are not recovered from the perineal or perianal skin. They come from the noses and throats of three groups of persons: the attendants, the visitors, and the patients themselves. From the upper respiratory tracts of these three groups the Group A streptococci are transferred to, and live for a time on the hands, in the air, and on inanimate objects or fomites. The patient may even inoculate herself with her fingers from her own mouth or transfer to her body streptococci which some visitor has given her in salutation. In examinations, in routine hospital handling, and in the preparation for the delivery room, the patient may receive Group A streptococci

*"Alcohol" (New York: The Macmillan Co.)

*Med. Ann. Dist. of Col., Feb., 1938.

from attendants, nurses, students, interns, or doctors. One need not be suffering from a septic sore throat in order to be a carrier of streptococci capable of inciting puerperal sepsis.

The modern concept of the etiology of puerperal sepsis places the emphasis once more on exogenous or extrinsic infection. Prevention, therefore, calls for the most rigid adherence to principles of asepsis, which must extend, not only to the periods of examination and delivery-room attention, but also to the care and contacts of the patient in the ward before and after delivery.

LELAND W. PARR, Ph.D.

Washington, D. C.

Senility and Hypothyroidism

ALL FIRES, whether those of our own bodies or otherwise, must have oxygen for combustion. If you are talking with people from forty to sixty years old, and you ask them something quickly, and they look at you with their mouths open and ask, "What?" and they ask it a second time, give them a metabolic test. It is most interesting to see these people who have burned out their thyroids, without any recognized trouble or pain, but the chemical action is gone (William Mayo).

Thyroid therapy may relieve many of the symptoms formerly thought to be due to senility.—MEYER GOLOB, M.D., in *Med. Rec.*, May 18, 1938.

Diagnosing Appendicitis in the Child

A PRACTICAL AID in the location of the maximum point of abdominal tenderness is the face-down (prone) position, followed by palpation of the anterior abdominal wall with the examiner's hands placed between the child and the bed. This procedure is especially valuable in children who have learned that if the right side hurts worse than the left, they will be operated upon. Such youngsters may try to conceal pain in the right side when lying on their backs, but when turned upon their faces will often admit right-sided pain, thinking that they are demonstrating greater discomfort on the left side.

Anatomically, the prone position permits the viscera to fall upon the anterior parietal peritoneum, and a quick, though gentle thrust of the fingers against the abdominal wall, often elicits severe pain and spasm, even to a protective arching of the back,

whereas the same abdominal pressure or sudden release in the usual face-up (supine) position produces little pain or spasm.—C. W. BRUNKOW, M.D., and HUGH CURRIN, M.D., in *Northw. Med.*, Jan., 1938.

Methylene Blue in Sulfanilamide Poisoning

THE METHEMOGLOBINEMIA and cyanosis which occur with sulfanilamide administration are usually transient and can be successfully combatted by the use of methylene blue, given orally or intravenously—10 cc. of a 0.1-percent solution intravenously for each 150 pounds of body weight. The dose of the drug should be decreased or stopped temporarily.

Sulfanilamide should not be used if (1) there is an already existing anemia; (2) if sulphur (other forms) have been or are being used; (3) if jaundice is present; (4) if the blood-cell count is low; or (5) if the kidney function is impaired to any extent.

Smoky urine or leukopenia calls for the immediate discontinuance of the drug.—G. W. KUTSCHER, M.D., in *South. Med. & Surg.*, Aug., 1938.

Early Recognition of Myocardosis*

MYOCARDOSIS should be used instead of the older, inaccurate term, "chronic myocarditis."

The patient may complain that he gets out of breath on climbing stairs or doing some work that he could do easily the previous year; he may complain of palpitation ("thumping," "skipping," "knocking"); he may notice that palpitation appears after habitual or customary effort (a very important symptom, indicating, with dyspnea and precordial distress, the development of cardiac degenerative changes); he may be troubled with substernal distress of a heaving or grip-like character; "indigestion" may be his summing up of epigastric fullness, burning sensation in the epigastrium, nausea and occasional vomiting; the only symptoms noted may be those of easy fatigability and insomnia without apparent cause.

Dyspnea, palpitation, substernal distress, indigestion, and insomnia are the predominant symptoms. A reduction of vital capacity is usually a consistent physical finding.

Treatment: Moderation in work and

**Ann. Int. Med.*, June, 1938.

play; rest and relaxation, if necessary, for an hour after lunch; a full night's sleep of eight hours; mental relaxation and forgetting of business worries at home; moderate exercise; moderation in sexual intercourse (many anginal attacks are precipitated by coitus). Overweight should be reduced by a diet which is not too strict, and not by thyroid extract therapy.

AARON E. PARSONNET, M.D., F.A.C.P.
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Iodized Oil in Asthma and Chronic Bronchitis

DURING the past four years we have given iodized oil intratracheally, as a therapeutic or diagnostic measure, or we have supervised its giving in cases of chronic asthma, bronchitis or bronchiectasis, more than 25,000 times, without a single severe untoward symptom being encountered. The results obtained make us feel that it is an indispensable diagnostic and therapeutic measure. As a means of draining the bronchial tubes and bronchiectatic areas in cases of intractable asthma, chronic bronchitis and bronchiectasis, iodized oil is comparable to the surgeon's scalpel in chronic septic surgical cases.—RAY M. BALLYEAT, M.D., Oklahoma City, before Pan American Medical Congress.

Treatment of Anal Eczema

WORMS (in children), diabetes, intestinal derangements, menopausal and other endocrine disturbances, and gout may cause anal eczema.

In acute anal eczema, forbid all salves and suppositories, as the patient may be allergic to the medication contained in them, especially mercury and balsam of Peru. It is best to place the patient at rest for a few days and to apply boric acid compresses. After the acuteness has subsided, a mild astringent solution may be applied, or a talcum and zinc oxide powder used.

In chronic anal eczema, remove the offending cause; apply a one-percent watery solution of resorcin or tannic acid; 3-percent silver nitrate solution may be used on cracks and fissures; the pruritus may be controlled by the application of one-percent phenol in glycerin. Two-percent pyrogallol-zinc paste may be applied daily to stubborn cases; the paste is wiped off with olive oil before a new application is made.—W. ENGELHARDT, M.D., in *Med. Welt.*, No. 9, 1938.

The "Nervous Woman"

VERY FREQUENTLY women of all ages will present themselves for the physician's consideration with a number of vague aches, pains, and complaints whose nature is uncertain, and whose management is a source of embarrassment to the doctor. Many doctors will consider this type of patient as a nuisance, and either hand her a bag of pills (usually a sedative of the barbiturate type) or tell her not to waste her money, since she is not really sick. Either procedure is wrong.

Nobody actually wants to see the doctor professionally. A patient comes to the doctor because he or she is ill. Whether the illness is due to some specific organic lesion or lesions, or whether it is due to psychic, or functional factors is up to the physician to decide. The patient complaining of pains and vague symptoms suffers from these, regardless of their source. She seeks the doctor to get relief from her discomfort, and is entitled to as much study as the person with acute appendicitis. Failure to give this care leads the sufferer to seek the quack, the cultist, or other competitor of the physician. It not only drives the patient from the physician's door, but leaves him with the feeling that nobody will be able to help him (or her) with any future ailments. This is especially true of the woman who has always had steadfast faith in her family doctor.

There are many cases of women whose complaints are so conflicting, so apparently non-organic, so trifling, so seemingly foolish, to the doctor, that he tends to look upon them as evils he must tolerate as part of his profession. This attitude has driven many patients from the physician to the quack. They really are important to both the physician and the patient, and merit careful attention by the former. Many of the seemingly non-organic sicknesses presented by these women are, in fact, organic, and they are dismissed summarily only because the physician is too lazy or too busy to give them the consideration they merit.

These women are suffering, and regardless of the cause of their symptoms, the doctor rightly is charged with seeking to allay their suffering. Many of the causes are not organic; but the doctor, by means of his common-sense, intelligence, scientific training, acquaintanceship with public services, and honest desire to help, can do much to benefit the woman, and at the same time advance his economic status.

ARTHUR J. TRONSTEIN, M.D.

Newark, Ohio

**Ohio St. M. J.*, Feb., 1938.

Diagnostic Pointers



Sinusitis Not a Focal Infection

• Sinusitis, either acute or chronic, rarely produces focal infection. High fever is rarely caused by nasal sinusitis, even when complete drainage block occurs, but is usually due to some complication of the sinusitis, or to the disease causing it (scarlet fever, "cold," influenza); and the same point should be made in regard to a high leukocyte count, high polymorphonuclear count, et cetera. Sinusitis may produce severe pain in the head when considerable drainage block occurs, or when intrasinus inflammation is unusually severe. On the other hand, more pus can be found in the nose without influencing the general health of the patient than in any other anatomic site with which I am familiar.—V. V. WOOD, M.D., F.A.C.S., in *Rad. Rev.*, Jan., 1938.

The Clavicle Sign in Hereditary Syphilis

• An enlargement of the internal third of the clavicle may be considered a definite sign of hereditary syphilis. It is found on the right clavicle, except when the person is left handed, in which case it may be found on the medial third of the left clavicle.—GEORGES C. HIGOUMENAKIS, M.D., in *Urol. & Cut. Rev.*, Nov., 1937.

Painless Discharge From the Ear

• The history of a discharge from an ear, appearing a few days to a few weeks after the beginning of a slowly developing deafness in that ear, unaccompanied at any time by pain, is suspicious of tuberculous otitis media.—W. M. BRICKNER, M.D., in "1000 Surgical Suggestions" (Surgery Publishing Co., N. Y.).

Alcohol and Paralysis

• Alcohol, even in large quantities, does not cause neuritis and paralysis directly. It causes indigestion, loss of appetite, and disturbances of the stomach and liver, so that the patient suffers from starvation, especially lack of vitamin B, and develops, not inflammation, but degeneration of the

nerves. Beer drinkers get enough yeast in their beverage to prevent the development of paralysis.—I. S. WECHSLER, M.D., New York City, before Pan American Medical Congress.

Chronic Middle Ear Infections

• At least 85 percent of purulent infections of the middle ear and mastoid are the result of a purulent sinusitis, nearly always on the same side as the infected ear and mastoid. The middle ear is really another nasal accessory sinus, so what affects the sinuses should affect the ear.

Ninety-one (91) percent of scarlet fever patients have a coincident infection in the sinuses (this is true also of influenza) and a large percentage are left with a chronic sinus infection that tends to last throughout life, unless diagnosed and treated.

Treatment of the sinus infection will often result in the cessation of the chronic discharge from the ear.—M. M. CULLOM, M.D., in *South. M. J.*, Aug., 1937.

Gastroscopy

• It is not possible to differentiate the various types of chronic gastritis except by the use of the gastroscope. Benign and malignant ulcers can be diagnosed with accuracy. Gastroscopy is not a painful nor dangerous procedure. It can be carried out in the office, and the patient is free to return home.—H. M. EBERHARD, M.D., in *Hahnemannian Monthly*, Jan., 1938.

Gout

• Gout is not diagnosed because: (1) we forget that it may affect the ankle, knee, and other joints, as well as the great toe; (2) we forget that it may involve several joints at once (5 percent of cases); (3) although gout commonly affects the great toe, it does so in only one-half of the cases, in the initial attack; (4) chronic arthritis, associated with distinct renal impairment, suggests gout until proved otherwise.—A. O. LUDWIG, M.D., in *Ann. Int. Med.*, Jan., 1938.

Thumbnail Therapeutics

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Appendectomy Technic

• After much experimental work, we feel that the best method of handling the appendiceal stump is by ligating it with catgut and invaginating it beneath a purse-string suture of fine, soft black silk. Adhesion formation is much less than when the stump is ligated and dropped. If the cecal wall is thick or difficult to reach, it may be best to merely ligate the stump. *Do not amputate the appendix with the cautery if the latter method is to be used, as the heat may result in premature sloughing, with resultant fatal peritonitis.*—J. K. DONALDSON, M.D., and H. S. THATCHER, M.D. in *South. M. J.*, May, 1938.

Avertin

• The serious toxic reactions of Avertin were surprisingly frequent and the death rate unreasonably high.

Avertin with amylene hydrate makes a poor showing, even when compared with a toxic agent like chloroform. It appears to be more dangerous than the discredited chloroform.—HENRY K. BEECHER, M.D., in *J.A.M.A.*, July 9, 1938.

Iodine in Thyroid Emergencies

• It is very important to administer iodine if a patient with hyperthyroidism is attacked by an infection or meets with an accident. He can thus be carried through a dangerous period.—HELMUT DENNIG, M.D., in *Ann. Int. Med.*, Feb., 1938.

Eye, Skin, and Bone Lesions in Syphilis

• In cases of syphilitic interstitial keratitis, neuroretinitis, and resistant skin and bone lesions, fever treatment with typhoid vaccine, given intravenously, is effective, cheap, and easy to use.—PAUL A. O'LEARY, M.D., Rochester, Minn.

Pituitrin in Labor

• Pituitrin should never be given to the patient in labor until the cervix is soft and

well dilated and until the physician is positive that the pelvis is adequate for the passage of the baby. *To give pituitrin to a patient who has a rigid cervix or who has a slow labor as a result of a small pelvic outlet, is to court disaster.*—EDMUND LISSACK, M.D., in *Rad. Rev.*, July, 1938.

Sodium Iodide in Painful Conditions

• Sodium iodide has been given, by intravenous injection, to patients suffering from sciatica, gonorrheal epididymitis, arthritis, and migraine, with marked relief of pain. The usual dose employed was from 10 to 20 cc. of 5-percent solution.—M. SILBERSTEIN, M.D., in *M. Rec.*, July 6, 1938.

Pentobarbital Sodium in Labor

• The first stage of labor is shorter by approximately 2.5 hours in primiparous women who have received pentobarbital sodium analgesia. There is no significant effect in this regard in multiparous women. The prenatal administration of calcium promotes the efficiency of uterine contractions and has been recommended as a prophylactic agent against "uterine inertia."—D. N. DANFORTH, M. S., M. B., and W. C. DANFORTH, M. D., in *W. J. of S. G. & O.*, July, 1938.

Treatment of Tetanus

• Antitetanic serum is not strictly curative, in the scientific sense of the term, if a full lethal dose of tetanus toxin has been fixed in the tissues of the body. If a full lethal dose has not been fixed or if tetanus is incipient, full doses of the serum should be given at the earliest possible moment and will prove life-saving. *Every case presenting stiffness and soreness of the jaw, no matter how slight, should receive antitetanic serum.* Because of our ignorance of all the factors involved in human tetanus, every case should receive large doses of the serum, in order to save the limited number that we have every reason to believe can be saved.—JOHN J. ABEL, M.D., and W. CHALIAN, M.D., in *Bull. Johns Hopkins Hosp.*, June, 1938.



THE DOCTOR'S STUDY

Good taste in reading is acquired only by reading.—BURTON RASCOE.

Dorland: Medical Dictionary

THE AMERICAN ILLUSTRATED MEDICAL DICTIONARY. A Complete Dictionary of the Terms Used in Medicine, Surgery, Dentistry, Pharmacy, Chemistry, Nursing, Veterinary Science, Biology, Medical Biography, etc., with the Pronunciation, Derivation, and Definition. By W. A. Newman Dorland, A.M., M.D., F.A.C.S., Lieut.-Colonel, M.R.C., U.S. Army; Member of the Committee on Nomenclature and Classification of Diseases of the American Medical Association; Editor of "American Pocket Medical Dictionary." Eighteenth Edition, Revised and Enlarged, with 942 Illustrations, Including 283 Portraits. With the Collaboration of E. C. L. Miller, M.D., Medical College of Virginia. Philadelphia: W. B. Saunders Company. 1938. Price, Plain, \$7.00; Thumb Indexed, \$7.50.

Every studious physician, and all, in any of the various branches of the healing arts, who are careful about the use of words, look forward eagerly to the appearance of each new edition of the famous "Dorland."

This volume, in addition to being the standard authority on spelling, pronunciation, capitalization, etymology, and usage of medical words, accepted by thousands of medical editors and writers, is a skeleton medical library, in itself. Here one will find an atlas of anatomy, with over 100 illustrations of arteries, nerves, veins, etc. in colors; a syllabus of diagnosis and treatment, with a dose table filling 7 pages; a laboratory manual (description of various tests occupy 32 pages, besides the descriptions of reactions and staining and fixing methods); a synopsis of medical history and biography; and much other practical and valuable information, excellently arranged for instant reference.

This new (18th) edition contains more than 5,000 new words, hundreds of which are not defined in any other medical dic-

tionary, and this and other added features have increased the size of the book by 34 pages. In spite of the immense amount of material contained between these covers (there are 1,607 pages of closely set but clearly readable type) the thin, opaque ("Bible") paper used, and the economical employment of space, make it an easy volume to handle. The student's convenience and ease of reference have been favored by the employment of a single notch for each letter of the alphabet, in the thumb index, instead of two letters to a notch, as in former editions.

No physician can get along without a medical dictionary, and none who aspires to the highest success will be content with anything less than the best and most up-to-date one—"Dorland, 18th Edition."

Ballenger: The Nose, Throat, and Ear

DISEASES OF THE NOSE, THROAT, AND EAR. By William L. Ballenger, M.D., F.A.C.S., Late Professor of Otolaryngology and Laryngology, College of Medicine, University of Illinois, Chicago, Fellow of the American Laryngological Association, et cetera; and Howard C. Ballenger, M.D., F.A.C.S., Assistant Professor of Otolaryngology, Northwestern University School of Medicine, Chicago; Surgeon, Department of Otolaryngology, Evanston Hospital, Fellow of the American Laryngological Association; etc. Seventh Edition, Revised. Philadelphia: Lea and Febiger. 1938. Price, \$11.00.

This massive volume covers the field very thoroughly. On comparing it with the Ballenger text of 1908, one is surprised to note that there are paragraphs and illustrations which have been retained over the period of thirty years. There is a definite

New Books

Any book reviewed in these columns will be procured for our readers if the order, addressed to CLINICAL MEDICINE AND SURGERY, Waukegan, Ill., is accompanied by a check for the published price of the book.

sense of disappointment on reading over the section concerning sinusitis and the common cold. The old purely surgical view of sinusitis therapy is still advocated and more modern methods of treatment are dismissed with a few pages (diathermy, infra-red rays, vaccino-therapy). No discussion is given of the Proetz method of displacement treatment for sinusitis, although thousands of these treatments have been given (it is mentioned diagnostically).

Surgical procedures are discussed thoroughly and made clear by many illustrations. The treatment of quinsy by incising the anterior pillar margin and dissecting down into the peritonsillar tissues is advocated; this method is almost ideal.

Chronic infections of the sinuses and tonsils are alleged to have "a possible etiologic relationship" with some 75 diseases, including hypertension, appendicitis, neurasthenia, acne, and hives.

This book can be recommended to the physician who is in actual contact with ear, nose, and throat patients, as it is replete with practical pointers on diagnosis and treatment.

Donnison: Civilization and Disease

CIVILIZATION AND DISEASE. By C. P. Donnison, M.D. (Lond.), M.R.C.P. (Lond.). With an Introduction by Sir Walter Langdon-Brown, M.A., M.D. (Camb.), Hon. D.Sc. (Oxon.), F.R.C.P. (Lond.). Baltimore: William Wood & Company. 1938. Price, \$5.00.

It is a matter of general knowledge among medical men that, along with the conquest of the communicable diseases which used to decimate communities, a new group of disorders has arisen which seems to be actually caused by what we call civilization. That impression appears to be fully confirmed in this modest and unassuming, but clear, direct, and truly masterly volume.

The author, whose experience in practice among primitive peoples qualifies him to speak with authority, demonstrates, step by step and in a cogent manner, that the group of organic diseases with a psychogenic background—hyperpiesia, diabetes mellitus, peptic ulcer, hyperthyroidism, rickets, and obesity—as well as the psychoneuroses, are truly diseases of civilization, and that a considerable list of other maladies, including angina pectoris, neurosyphilis, dental caries, appendicitis, and a dozen or more others, are under suspicion of being in the same category.

Dr. Donnison's thesis is not so spectacularly presented as Crile's along the same lines, but the foundation is more soundly laid and every chapter is fully documented. The transmission of these diseases is said to be by "social heredity" or conditioned reflexes induced by the parents; which, of course, is not heredity at all, but definitely environmental—in fact, nothing else but *wrong education*.

Here is a well-written and *original* book, no longer than the average novel and little more expensive, which every practicing clinician should read from cover to cover without unnecessary delay, because such reading would add materially to his ability and success in the treatment of disorders which are increasingly common, and thus add to his prestige and income.

Kurtzahn: Minor Surgery

KLEINE CHIRURGIE (MINOR SURGERY). By Professor Dr. Hans Kurtzahn, Königsberg. Berlin: Urban and Schwarzenberg. 1937. Price, paper bound RM12; cloth bound RM13.50.

One cannot fail to be enthusiastic about this handy volume. There are 177 life-like illustrations which portray various surgical procedures and conditions. One can gain many pointers on technic merely by looking these over. The current trend in this country is to remove a portion of the bone after a traumatic amputation of part of the finger. Kirschner's suggestion of making a transverse relaxation incision across the finger (just through the skin) about one-fourth of an inch below the level of the amputation is good, as the skin can be sutured over the stump without sacrificing more bone.

Emphasis is laid upon the wide drainage of a localized infection (abscess) by removing a circle of skin overlying the purulent collection. This step prevents the closure of the incision before drainage is complete.

The discussions on each disease entity are models of brevity and clearness.

R. L. G.

Appleton, Hamilton, and Tchaperoff: Surface and Radiological Anatomy

SURFACE AND RADIOLOGICAL ANATOMY. For Students and Practitioners. By A. B. Appleton, M.A., M.D. (Cantab.), Professor of Anatomy, University of London and Director of the Department of Anatomy, Medical School of St. Thomas's Hospital, London, Late Fellow of Downing College, Cambridge; William J. Hamilton, M.D., B.Ch. (Belf.), D.Sc. (Glas.), F.R.S.E., Professor of Anatomy in the University of London at the Medical College of St. Bartholomew's Hospital; Late Deputy Director of the Department of Anatomy, Medical School of St. Thomas's Hospital, London; and Ivan C. Tchaperoff, M.A., M.D., B.Ch. (Cantab.), D.M.R.E., Assistant Radiologist at St. Thomas's Hospital, London. Baltimore: William Wood and Company. 1938. Price, \$5.50.

Those who have been out of medical school and away from the dissecting table for a number of years often feel that there are great gaps in their anatomical knowl-

edge and that physical diagnosis is thereby impaired. This beautifully lithographed and illustrated book makes anatomy seem easy; it correlates the surface appearance of one portion of the body with its anatomic and radiologic aspects, so that one can learn to see and feel, through the intact skin, the muscular and bony structures within. It would be well if all our physical diagnosis texts could be made as clinically valuable by placing, side by side, the photograph of a leg, colored anatomic illustrations of arteries, nerves and muscles, and finally, roentgenographic plates of bones and joints.

It is impossible to read this book without growing enthusiastic about it. No student or practitioner can fail to learn and to enjoy it.

Stepp, et al.: Vitamins

THE VITAMINS AND THEIR CLINICAL APPLICATIONS. A Brief Manual. By Prof. Dr. W. Stepp, Director of the I. Medical Clinic, University of Munich; Docent Dr. Kühnau, Director of the Municipal Institute for Balneology and Metabolism, Wiesbaden; and Dr. H. Schroeder, Associate at the I. Medical Clinic, University of Munich. Translated by Herman A. H. Bowman, M.D., Minneapolis, Minnesota. Milwaukee: Vitamin Products Co. 1938. Price, \$4.50.

Few branches of research have survived such tempestuous development as has the study of vitamins; and while there is still much to learn, the clinical application of these substances is becoming fairly clear.

This manual takes up each of the known vitamins separately, giving its history, chemistry, determination, occurrence, manifestations, absorption, clinical application, physiology, preparation, and dosage. A chart of the survey of vitamins known today and a chart showing the contents of essential vitamins in various diets are included. Valuable information is given in the chapters on Terminology of the Vitamins, Vitamins and Human Nutrition, and The Daily Vitamin Requirements for Man. The extensive bibliography given for each of the vitamins should be useful, especially to research workers in this field.

This is a well written, easily understandable, and definitely practical reference book, which should be decidedly helpful to every practicing physician.

Kagan: Life of Fielding H. Garrison

LIFE AND LETTERS OF FIELDING H. GARRISON. By Solomon R. Kagan, M.D. With an Introduction by Professor James J. Walsh, M.D., Ph.D., Litt.D., Sc.D. Boston: The Medico-Historical Press. 1938. Price, \$3.00.

The press has been flooded with the biog-

raphies of financiers, queens of the dance (and boudoir), and other persons who are notorious rather than famous. It is good to turn to the biography of a physician who was one of the first in this country (after John Shaw Billings) to study medical history and medical accomplishments, and to establish a working system of classification and indexes for medical publications. He desired not the plaudits of the operating amphitheater nor the profits of private practice, but rather the hard and rocky road of the medical librarian and bibliographer.

Dr. Kagan's sympathetic word portrait of Garrison is one that will be enjoyed. It is only to be regretted that it did not occupy more space and Garrison's letters less, though the latter documents reveal the true spirit of the man himself, his generosity and willingness to help others from his own small salary, his desire to assist young physicians to get ahead and to work in medical history, his wide-spread interest in painting, literature and music.

No physician who aspires to the highest ranks in his profession can afford to neglect the study of the inspiring history of that profession and the lives of the men who have made it.

Williams and Spies: Vitamin B₁ in Medicine

VITAMIN B₁ (THIAMINE) AND ITS USE IN MEDICINE. By R. R. Williams, Sc.D., of the Bell Telephone Laboratories, New York City, and Tom D. Spies, M.D., Associate Professor of Medicine, University of Cincinnati. New York: The Macmillan Company. 1938. Price, \$5.00.

For those physicians who are interested in more than mere symptoms and treatment of pathologic disturbances of which they know little etiologically, this monograph will be of absorbing interest.

The chief function of vitamin B₁ is to regulate the most fundamental of all life processes, cell respiration. This should interest all practitioners, as many forms of neuritis and allied disorders are directly related to impairment of this function.

The rôle of this vitamin in gastrointestinal disorders, in the vomiting and polyneuritis of pregnancy, in cardiovascular disorders, in maintenance of growth and health, is summarized from clinical and experimental evidence. Beriberi and closely related vitamin deficiency diseases are described, as are a number of related entities, such as neuritis of alcoholics, pellagra, hunger edema, and failure of normal growth due to lack of vitamin B₁.

Attention is called to the possible failures in the use of preparations which contain many other ingredients than the vitamin B₁ (as in yeast extract, liver, wheat germ), and whose vitamin content has not been standardized. Now that the pure vitamin has been obtained, it is not necessary to depend upon these other medicaments of

variable vitamin content, although they have valuable uses. Attention is also directed to the fact that the Sherman unit is not an accurate measure of vitamin B₁ activity, due to varying laboratory standards and animals. "Some commercial concerns wish to continue the use of Sherman units because the number of units is greater when expressed in these units than when expressed in terms of International units."

As there is no test for vitamin B₁ deficiency, the clinician must be guided by clinical findings and by a dietary history which would indicate a lack of fresh native vegetables and fruits and other foods (peas, beans, whole-grain cereals, liver, eggs, milk).

The second portion of the monograph describes the historical background and research into thiamin and its chemical structure, as well as that of related chemicals.

Thus the book is a complete reference text on this important vitamin; it cannot be too well recommended for its careful survey of the hundreds of articles that have been written and for its impartial, conservative survey of the whole field.

The Pituitary Gland

THE PITUITARY GLAND. An Investigation of the Most Recent Advances. *The Proceedings of the Association for Research in Nervous and Mental Disease.* Baltimore: Williams and Wilkins Company. 1938. Price, \$10.00.

This volume contains the Proceedings of the Association for Research in Nervous and Mental Diseases, of December 28 and 29, 1936.

The anatomy, physiology (including the various hormones and their clinical relationships), and general considerations of the pituitary gland are presented.

Mortimer's study on the influence of anterior pituitary hormones on the cranial form and structure are of marked clinical interest. By careful roentgenologic study, he is able to diagnose between hyperfunction of the anterior lobe and hypofunction. Hyperfunction resulted in either (1) a generalized overgrowth of cancellous bone throughout the cranium and face, resembling that seen in acromegalic patients with the "large" head; or (2) increase of cancellous and sclerosed bone, the sclerosis apparently occurring secondarily. Hypofunction was evidenced by (1) a small head, which had failed to grow or to differentiate; or (2) a small head which was distinguished by well marked sclerosis. Of those patients who received a clinic diagnosis of pituitary dysfunction, over 92 percent had been previously recognized by examination of the cranial roentgenogram.

Many clinical applications are stressed, notably on the use of commercial glandular products (Antuitrin-S, Follutein, et cetera). The discussions are conservative and authoritative.

Carleton and Leach: Histologic Technic

HISTOLOGICAL TECHNIQUE. For normal Tissues, Morbid Changes and the Identification of Parasites. By H. M. Carleton, M.A., B.Sc., D.Phil., University Lecturer in Histology, Oxford; Research Fellow of New College, Oxford; and E. H. Leach, M.A., B.Sc., Demonstrator in Histology, Oxford; Hulme Lecturer in Physiology, Brasenose College, Oxford. Second Edition. London and New York: Oxford University Press. 1938. Price, \$7.25.

This is a complete, practical guide to the use of histologic methods and stains. Part I discusses the cell as a structural and physico-chemical entity and outlines the method used in histology.

Part II considers fixation, dehydration, clearing, embedding, section cutting, theory and practice of staining, equipment, formulas for staining, and types of staining methods.

Part III covers accessory methods of examination, including dark-ground (oblique) illumination, histochemical tests, injection methods, and methods of vital staining.

Methods employed in the study of special organs, tissues, and cell components are discussed in Part IV (adrenal bodies, alimentary canal, blood films, blood-forming organs, blood vascular system, bone and decalcification, on through Golgi bodies, pituitary body, et cetera). The technic of morbid histology comprises the fifth and final chapter.

Within the first few pages, the authors give a beautifully worded and concise description of the cell as an entity, including a discussion on the cytoplasmic components and the colloidal conception of protoplasm.

The book is well adapted, in every way, to its purpose.

Burrow: Human Conflict

THE BIOLOGY OF HUMAN CONFLICT. An Anatomy of Behavior, Individual and Social. By Trigant Burrow, M.D., Ph.D., Scientific Director of the Lifwynn Foundation. New York: The Macmillan Company. 1937. Price, \$3.50.

Here we have the scientific research method which, in its application, has long distinguished the establishment of basic principles in medical fields, applied to individual and social psychophysical disturbances which, in various forms and degrees, are ever perplexing physician and social worker and interfering with the happiness of man.

While Freudian conceptions represented a decided advance in some respects, they prove inadequate in accounting for the causative factors in neurosis and insanity. The individual psychology of Adler is also incomplete. The thesis of Dr. Burrow is that a consideration of personality disorders must embrace the normal as well as the

neurotic individual's reactions, and calls for a shift in the method of attack. This special study, as undertaken and evaluated by the author, consists of a group analysis of a representative cross-section of society over a comprehensive period of years. It deals with man in adjustment to himself and others as a problem in behavior, in biology, and in evolution.

Beginning with the enigmatic situation by which man and the social community have been compelled to substitute "labels of things for things," the author shows how the "lost touch" with actual objects and events and the "biological solidarity of his own organism" possess deep medical significance in respect to insanity and crime. The general acceptance by traditional psychiatry, that mental disorders consist in a disagreement or disparity between a patient's ideas or mental content and the ideas or mental content of the so-called normal persons about him, must be set aside for the more fundamental fact presented here, that the real disparity is deeply rooted in the biology of man as a race.

This leads directly to the more consistent regard for insanity as a disease of the total body, with feeling and thinking regarded as total reactions. Man is ever hemmed in by problems, many of which he creates and throws in his own way, "out of sheer delight in working through them"; many are thrust upon him; one of these is found in the element of conflict within his own behavior, and this is an ever-present major problem.

The practicing physician, psychologist, and scholar who is increasingly concerned with a better understanding of the interrelation and solution of a patient's problems will wish an acquaintance with this laboratory undertaking in an unexplored field.

A. N.

Glaister: Medical Jurisprudence and Toxicology

GLAISTER'S MEDICAL JURISPRUDENCE AND TOXICOLOGY. Edited by John Glaister, M.D., D.Sc., Barrister-at-Law, Regius Professor of Forensic Medicine, University of Glasgow; Formerly Professor of Forensic Medicine, University of Egypt, Cairo; and Medicolegal Consultant to the Egyptian Government. 6th Edition. Baltimore: William Wood and Company. 1938. Price, \$8.00.

This is a very complete textbook on the medicolegal field, from fingerprints to poisons. Certain of the legal principles quoted are applicable only in the British Isles, although the general tenor of the laws is closely alike on both sides of the Atlantic.

The chapter on wounds is especially valuable, because of its complete description of various types of fatal wounds. Cases are presented, with illustrations, of persons who died of suicidal cut-throat. It has been claimed, by anatomists and surgeons, that a self-inflicted cut throat is rarely fatal,

as the average lay individual's knife is deflected by the thyroid cartilage.

Dermal prints, palmar prints, maggot identification, seminal fluid grouping, technique for sectioning hair, blood grouping, and war gases are newly revised topics.

The discussion of pregnancy in the very young and in the elderly is especially interesting.

The text throughout is intensely practical. Details of technics for examination of hairs, dead bodies, identification of physical characteristics and blood stains are given fully.

Impotence may be a basis for annulment of marriage, if it is of organic and of uncorrectible origin. A man may be impotent with one woman because of psychological reasons, yet be able to have intercourse with other women. Divorce was granted in such cases.

Every active clinician should have a book of this kind in his library, because no man can tell when he will encounter a case which will develop legal complications, and much trouble may be saved if one knows how to deal with such a situation.

Schroeder: The Nature of Obscenity

A CHALLENGE TO SEX CENSORS. By Theodore Schroeder. Privately printed by the Author to promote the Aims of the Free Speech League. 1938.

The author of this small but worthwhile volume has been called a "superspecialist in human liberty," and has exercised the resources of his remarkable intellectual equipment with peculiar zeal and effect toward the demolition of the superstition of "obsenity," which he, quite soundly, classifies in the same category with the obsolete or unpopular superstition of a belief in the reality of witchcraft.

His thesis is that "obsenity" resides, not in any play, movie, picture, book, or other object, but in the psychically abnormal mind of the persons who consider the object "obscene."

In a previous book ("Obscene Literature and Constitutional Law"), he has shown that all laws for the suppression of "obsenity" are unconstitutional. In this one he backs up his thesis by well-chosen quotations from eminent psychologists, including Havelock Ellis (the greatest expert in such matters as this), Dr. William A. White, and Kraft-Ebing, and such outstanding ecclesiastics as Bishop Phillips Brooks and the Rev. Henry More. (He seems to have overlooked St. Paul, who stated this thesis with great exactitude in the fifteenth verse of the first chapter of his letter to Titus).

No open-minded and psychically normal person can read this book without admitting that Mr. Schroeder's thesis is fully proved, and it is cordially recommended to all physicians who have any doubts on the subject, or are already convinced, but are in search of arguments to back up their position.

No price has been quoted on this book, and the author states that he expects to make no profit upon it. Those who are interested will do well to write him directly,

stating where they saw this review.

His address is: Theodore Schroeder, 310 E. 74th St., New York City.

New Books Received

The following books have been received in this office and will be reviewed in our pages as rapidly as possible.

ANUS, RECTUM, SIGMOID COLON. Diagnosis and Treatment. By Harry Ellicott Bacon, B.S., M.D., F.A.C.S., F.A.P.S. Introduction by W. Wayne Babcock, A.M., M.D., LL.D., F.A.C.S. Foreword by J. P. Lockhart-Mummery, M.A., M.B., B.C. (Camb.), F.R.C.S. (Eng.). Philadelphia: J. B. Lippincott Company. 1938. Price, \$8.50.

LABORATORY MANUAL OF HEMATOLOGIC TECHNIC. Including Interpretations. By Regena Cook Beck, M.A., M.D. With a Foreword by Frank W. Konzelmann, M.D. Philadelphia and London: W. B. Saunders Company. 1938. Price, \$4.00.

SURGICAL PATHOLOGY. By William Boyd, M.D., LL.D., M.R.C.P. Ed., F.R.C.P. Lond., Dipl. Psych., F.R.S.C. 4th Edition, Thoroughly Revised. Philadelphia and London: W. B. Saunders Company. 1938. Price, \$10.00.

HEART DISEASE AND PREGNANCY. By Crighton Bramwell, M.A. (Camb.), M.D. (Manch.), F.R.C.P. (Lond.) and Edith A. Longson, M.B., Ch.B., D.P.H. (Manch.) With a Foreword by Sir Ewen MacLean, M.D., F.R.C.P., LL.D., D.Sc., etc. New York: Oxford University Press. 1938. Price, \$3.00.

THE HISTORY OF BACTERIOLOGY. By William Bullock, M.D., F.R.S. New York: Oxford University Press. 1938. Price, \$3.75.

DYSMENORRHOEA. Its Etiology, Pathology, and Treatment. By Albert A. Davis, M.D., Ch.M., F.R.C.S. New York: Oxford University Press. 1938. Price, \$4.50.

THE PRINCIPLES AND PRACTICE OF OBSTETRICS. By Joseph B. DeLee, A.M., M.D. 7th Edition, Entirely Reset. Philadelphia and London: W. B. Saunders Company. 1938. Price, \$12.00.

DER RHEUMATISMUS SERIES. Rheumatische Kreislaufschädigungen. By Dr. Siegfried Dietrich. Dresden and Leipzig: Verlag von Theodor Steinkopff. 1938. Price, RM 6.25.

FRACTURES OF THE JAWS. By Robert H. Ivy, M.D., D.D.S., F.A.C.S.; and Lawrence Curtis, A.B., M.D., D.D.S., F.A.C.S. 2nd Edition Thoroughly Revised. Philadelphia: Lea & Febiger. 1938. Price, \$4.50.

MARTIN'S PRINCIPLES AND PRACTICE OF PHYSICAL DIAGNOSIS. Edited by Robert F. Loeb, M.D. From the Author-

ized Translation by George J. Farber, M.D. 2nd Edition. Philadelphia: J. B. Lippincott Company. 1938. Price, \$2.00.

THE TECHNIQUE OF CONTRACEPTION. An Outline. By Eric M. Matsner, M.D. Foreword by Frederick C. Holden, M.D. 4th Edition. Baltimore: The Williams & Wilkins Company. 1938. Price, \$0.50.

MEDIZINISCHE PRAXIS SERIES. Volume 9. Blutung und Fluor. By Prof. Dr. Hans Runge. Dresden und Leipzig: Verlag von Theodor Steinkopff. 1938. Price, RM 5.25, paper bound; RM 6.—, cloth bound.

THE NEW INTERNATIONAL CLINICS. Edited by George Morris Piersol, M.D. Volume III, New Series One, September, 1938. Philadelphia: J. B. Lippincott Company. 1938. Price, \$3.00, current year; \$5.00, back years.

FEMININE HYGIENE IN MARRIAGE. By A. F. Niemoeller, A.B., M.A., B.S. With a Foreword by Winfield Scott Pugh, B.S., M.D. New York: Harvest House. 1938. Price, \$2.00.

THE PRINCIPLES AND PRACTICE OF MEDICINE. Designed for the Use of Practitioners and Students of Medicine. Originally Written by the Late Sir William Osler, Bart., M.D., F.R.C.P., F.R.S. 13th Edition. Revised by Henry A. Christian, M.D., LL.D., S.D., F.R.C.P. New York and London: D. Appleton-Century Company, Inc. 1938. Price, \$9.00.

A TREATISE ON THE LEGAL ASPECTS OF CHRISTIAN SCIENCE. By I. H. Rubenstein, of the Chicago Bar. Chicago: The Crandon Press. 1938. Price, \$1.00.

TRAUMATIC HEART LESIONS. Subacute and Chronic Pericardial and Myocardial Lesions Due to Non-Penetrating Traumatic Injuries. A Clinical Study. By Erik Warburg, M.D. With a Short Biography of Oluff Borch (Olaus Borrichius) by Torben Geill, M.D. New York: Oxford University Press. 1938. Price, \$6.00.

EXPERIENCE IN THE MANAGEMENT OF FRACTURES AND DISLOCATIONS. (Based on an Analysis of 4390 Cases.) By the Staff of the Fracture Service, Massachusetts General Hospital, Boston. Under the General Editorship of Phillip D. Wilson, M.D. Philadelphia: J. B. Lippincott Company. 1938. Price, \$15.00.

Medical News

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Courtesy of Frober-Faybor Co.

Testing Vitamin-A Deficiency

AN INSTRUMENT—the Bio-Photometer, shown above—has been devised for making immediate and quantitative tests of the vitamin A in a person's blood. Deficiency of this vitamin is now believed to be widespread.

The test is based upon the fact that the rate of regeneration of the visual purple in the eye, after it has been exposed to a bleaching light for a standard period of time, is influenced by the amount of vitamin A in the system and is speeded up by supplementary administration of this vitamin.

Where this apparatus is available, it will no longer be necessary to guess whether or not a patient is well supplied with vitamin A.

Simple Test for Pregnancy

A QUICK, SIMPLE, AND RELIABLE TEST for pregnancy has long been needed, and now appears to have been found, as a placental extract prepared for intradermal injection,* the positive or negative reaction to which can be determined within ten minutes, and seems to be as accurate as the results of the more elaborate and time-consuming tests.

*Marketed, as Pregnacol, by the Ernst Bischoff Co.

International Postgraduate Assembly

THE INTERNATIONAL MEDICAL ASSEMBLY of the Interstate Postgraduate Medical Association will be held at Philadelphia, Pa., October 31 to November 4, inclusive, 1938. There is no other place nor way in which a physician can obtain so much concentrated and practical postgraduate instruction in so short a time and at such small expense as by attending these Assemblies. Every medical man who can possibly do so should be there. For full particulars, write to Dr. W. B. Peck, Freeport, Ill.

Academy of Physical Medicine

THE ACADEMY OF PHYSICAL MEDICINE will hold its scientific session, with the collaboration of the Government medical and scientific services, at the Hotel Willard, Washington, D. C., October 24, 25, and 26, 1938. Clinics and demonstrations will be held at Walter Reed General Hospital and St. Elizabeth's Hospital. All physicians are invited. Particulars will be sent on request addressed to Dr. Herman A. Osgood, 144 Commonwealth Ave., Boston, Mass.

Opening in North Carolina

A COMMUNITY of about 5,000 people, in North Carolina, is without a medical attendant within a reasonable distance. It is reported that most of them are substantial folk, and that there are two churches and a good school. It would seem that an able and active physician should be able to make a living from the start. For further particulars, write to Mrs. J. B. Maynard, Wade (Cumberland Co.), N. C.

Institute for Medical Research

THE NEW SQUIBB INSTITUTE for Medical Research will be dedicated, with impressive ceremonies, at New Brunswick, N. J., on October 11, 1938. This Institute of pure science is the first of its kind to be founded in the pharmaceutical industry, and may well prove to be an important factor in the development of the science of Medicine.



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- 5 Specific Urethritis—Gonosan "Riedel." Riedel & Co., Inc.
- 6 Dr. Weirick's Sanitarium. Dr. G. A. Weirick.
- 9 Elixir Bromaurate in the Treatment of Whooping Cough and other Persistent Coughs. Report of Cases. (Booklet.) Gold Pharmacal Co.
- 11 Chondroitin; for Treatment of Idiopathic Headache. The Wilson Labs.
- 15 Cough—Its Symptomatic Treatment. Martin H. Smith Co.
- 17 Feeding Diabetic Patients. Knox Gelatine Labs.
- 19 Menstrual Regulation by Symptomatic Treatment. Martin H. Smith Co.
- 20 Hyperol. A Utero-Ovarian Tonic and Corrective. Purdue Frederick Co.
- 21 Gray's Glycerine Tonic Comp. Purdue Frederick Co.
- 22 Feeding Sick Patients. Knox Gelatine Labs.
- 25 Clinical Guide for Female Sex Hormone Therapy. Schering Corp.
- 27 Reducing Diets and Recipes. Knox Gelatine Laboratories.
- 33 Foot Weakness and Correction for the Physician. The Scholl Mfg. Co., Inc.
- 38 Protecting the Expectant Mother. Corn Products Sales Co.
- 41 Oreton—Male Sex Hormone. Schering Corp.
- 43 Karo Syrup for Infant Feeding. Corn Products Sales Co.
- 46 Vitafer. A Reconstructive Tonic containing Antianemic Factors with Vitamin B. The National Drug Co.
- 50 Gestasol. The Follicular and Luteinizing Fractions obtained from Human Placentas. The National Drug Co.
- 51 Formaldehyde for Urinary Antisepsis. Schering & Glatz, Inc.
- 54 Use of Zinc Borate in Otolaryngology. Hille Laboratories.
- 78 Argyrol in Urology and Gynecology. A. C. Barnes Company.
- 79 Hydrocyanate of Iron—Pharmacologically Correct in the Treatment of Epilepsy. The Tilden Co.
- 83 Iocapral. An Arterial Antispasmodic. Winthrop Chemical Co., Inc.
- 89 Free Iodine as a Therapeutic Agent. Burnham Soluble Iodine Co.
- 91 Adrenal Cortex; for the Treatment of Addison's Disease and Asthenia. The Wilson Labs.

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| <p>95 Low Cholesterol, Low Fat, Low Caloric Diet List for Distribution to Patients. Burnham Soluble Iodine Co.</p> <p>96 Eburol, a Healing Ointment for Burns, Wounds and Ulcers. Ernst Bischoff Co.</p> <p>99 A Survey in Two Fields of Medicine. A. C. Barnes Co.</p> <p>100 Neo-Plasmoid. The Modern Solution For the Injection Treatment of Hernia. Farnsworth Labs.</p> <p>105 Ovoidermin. Iron in its Most Efficient Subdivision. A. C. Barnes Co.</p> <p>110 Parenteral Calcium Therapy—A Review of the Literature with Comprehensive Bibliography. Loeser Laboratory, Inc.</p> <p>111 Argyrol in Ophthalmology. A. C. Barnes Company.</p> <p>112 Oxygen-Ozone and Octozone. Octozone Equipment Co.</p> <p>116 Alparene—An Effective Sclerosing Solution for the Injection Treatment of Hernia. Dequin Physicians' Products Co.</p> <p>123 Resumé of Venereal Therapy. Mallinckrodt Chemical Works.</p> <p>124 Soricin in the Treatment of Intestinal Toxemia. The Wm. S. Merrell Company.</p> <p>126 Subenon—Anti-arthritis and Anti-rheumatic. Seydel Chemical Co.</p> <p>130 Allantoin Ointment 2% in Slow and Non-healing Wounds and in Burns. The National Drug Co.</p> <p>135 Argyrol in Otorhinolaryngology. A. C. Barnes Co.</p> | <p>137 Barium Sulfate. Resumé of Use in Alimentary Roentgenology. Mallinckrodt Chemical Works.</p> <p>139 Standardization of Estrogenic Hormone. Reed & Carnrick.</p> <p>140 Paramon—Analgesic. Seydel Chemical Co.</p> <p>142 Anabolin. A Detoxicative Hormone from the Liver. The Harrower Laboratory, Inc.</p> <p>143 The Physicians' Conquest of Syphilis. The Tilden Co.</p> <p>144 The Vicious Circle. Schering & Glatz, Inc.</p> <p>145 Zymenol—to Aid Normal Evacuation Without Irritant Drugs or Bulk-producing Agents in Both Constipation and Colitis. Otis E. Glidden & Co., Inc.</p> <p>146 Moru-Quin for Injection Treatment of Varicose Veins. The National Drug Co.</p> <p>148 Ampoule Products for Subcutaneous, Intramuscular, and Intravenous Medication. Associated Physicians Labs.</p> <p>150 Constipation and Hemorrhoids. Wm. R. Warner & Co.</p> <p>151 Cofron Liver Concentrate. Abbott Laboratories.</p> <p>152 Avoiding the Water Hazard. Wm. R. Warner & Co.</p> <p>153 Haliver Oil with Viosterol. Abbott Labs.</p> <p>154 Cyclopropane for Anesthesia. Mallinckrodt Chemical Works.</p> |
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